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THE

NEW ZEALAND

OFFICIAL YEAR-BOOK

1904.

(THIRTEENTH YEAR OF ISSUE.)

Prepared under instructions from the
Right Honourable R. J. SEDDON, P.C., Prime Minister,
by E. J. von DADELSZEN, Registrar-General.

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Kaipara Har.
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AUCKLAND
Manukau Har.
Waikato R.
Bay of Plenty
East C.
Kawhia Har.
NEW PLYMOUTH
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NAPIER
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Clutha R.
Foveaux Strait
Stewart I.
Dusky Sd
Te Anau
L. Wanaka
L. Hawea
L. Wakatipu
L. Manapouri
L. Te Anau
Waitaki R.
Rangitata R.
Waimakariri R.
Buller R.
Grey R.
Mokau R.
Waikato R.
Rangitikei R.
Wanganui R.
Manawatu R.
Hutt R.
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Kaipara
Dargaville
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Tauranga
Opotiki
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Taupo
Tokaanu
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Waiouru
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Opunake
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Te Aroha
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Sumner
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Bluff
Foveaux Strait
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Christchurch
Dunedin
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New Caledonia
Norfolk I.
Fiji
Chatham I.
Campbell I.
Auckland I.
Antipodes
Kermadec I.
Three Kings
North C.
Cook Strait
Foveaux Strait
Stewart I.
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175°
178°
167°

THE

NEW ZEALAND

OFFICIAL YEAR-BOOK

1904.

THIRTEENTH YEAR OF ISSUE.

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PREPARED UNDER INSTRUCTIONS FROM THE

RIGHT HONOURABLE R. J. SEDDON, P.C.,

PRIME MINISTER.

BY

E. J. VON DADELSZEN,

REGISTRAR-GENERAL.

WELLINGTON, N.Z.

BY AUTHORITY: JOHN MACKAY, GOVERNMENT PRINTER.

LONDON: EYRE AND SPOTTISWOODE, FLEET STREET, E.C.

1904.

PREFACE.

THIS is the thirteenth issue of the New Zealand Official Yearbook.

The plan of publishing pamphlets of "Advance Sheets" from time to time, as the work is printed, has been again followed on this occasion.

By this means an earlier publication is insured of small quantities of matter at a time, and suitable for mailing by parties having correspondents.

The pamphlets are also used by the Agent-General in London.

E. J. VON DADELSZEN.

Registrar-General's Office,
Wellington, N.Z., 6th October, 1904.

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1904.

ADDENDA ET CORRIGENDA.

On page 21: Supreme Court Judges—H. S. Chapman held office until March, 1852.

On page 26: Consul of France in New Zealand (with jurisdiction over the Cook Archipelago, Suwarrow, Penrhyn, and Palmerston Islands, and the Tonga Islands)—Robert Boeufvé, *vice* Count de Courte.

On page 26: Vice-Consul for Argentine Republic at Dunedin—Hon. T. Fergus.

On page 26: Vice-Consul for Belgium at Wellington—G. F. Johnston, Esq.

On page 27: Vice-Consul for Netherlands at Dunedin—George Ritchie, Esq.

On page 27: Consular Agent of Italy at Dunedin—James Mills, Esq.

On page 29: New Zealand Cross—Wrigg, Harry C. W. Cross given 1898 for service rendered in 1867.

On page 30: Retired Judges of the Supreme Court—*Add* the name of Edward Tennyson Conolly.

On page 30: Governor of New Zealand—Lord Ranfurly's term of office having expired, he is succeeded by the Right Honourable Sir William Lee, Baron Plunket, K.C.V.O.

GOVERNOR OF NEW ZEALAND.

20TH JUNE, 1904.

PLUNKET, His Excellency The Right Honourable Sir William Lee, fifth Baron (United Kingdom, 1827), formerly an Attaché in the Diplomatic Service, and subsequently Private Secretary to successive Lords Lieutenant of Ireland (1900–4); Knight Commander of the Royal Victorian Order; son of fourth Baron (Archbishop of Dublin); born 19th December, 1864; succeeded 1897; married, 1894, Lady Victoria Alexandrina Hamilton-Temple-Blackwood, daughter of first Marquess of Dufferin and Ava, K.P., G.C.B., &c. Issue: Two sons (Honourables Terence and Brinsley), four daughters (Honourables Helen, Eileen, Moira, and Joyce). Appointed 9th March, 1904, and assumed office 20th June, 1904, as Governor and Commander-in-Chief in and over His Majesty's Colony of New Zealand and its Dependencies. Salary, £5,000. Allowance on account of establishment, £1,500, and travelling-expenses, £500 per annum. The allowance is not payable for any period during which the Governor is absent from the colony. Residences: Old Connaught, Bray, County Wicklow, Ireland; Government House, Wellington; Government House, Auckland.

Private Secretary: Horace Clare Waterfield, Esq.

1st Aide-de-Camp: Captain Francis Powell Braithwaite, 5th Northumberland Fusiliers.

Aides-de-Camp: Lieutenant the Honourable Arthur Maurice Robert Bingham, 5th Lancers. Captain John Hugh Boscawen (honorary).

On page 30, twelfth line: After "ex-Ministers" *insert* the words (omitted since 1902) "whose names do not appear in the foregoing list," and further on *delete* "A. J. Cadman," and "Sir J. G. Ward," these being previously mentioned as having been knighted.

On page 32: Speaker of the Legislative Council—Hon. Sir A. J. Cadman, K.C.M.G., elected 7th July, 1904.

On page 32: Chairman of Committees, Legislative Council—Hon. R. H. J. Reeves; elected 6th July, 1904.

On page 33: Hon. Sir George Maurice O'Rorke, Kt., Auckland, summoned to Legislative Council, 25th June, 1904.

On page 35: O'Meara, John, Pahiatua, deceased; Mr. W. H. Hawkins elected 28th July, 1904.

On page 37: Printing and Stationery Department, now a class of itself, should be transferred to page 47, and precede Stamp Department.

On page 69: Westport Harbour pilotage (compulsory) and port charges altered:—

Since the 1st January, 1904, the pilotage and towage charges have been altered and now are: Pilotage (compulsory)—Sailing-vessels up to 120 tons, 1d. per net registered ton each way (in and out); sailing-vessels exceeding 120 tons, and not exceeding 1,500 tons register, 2d. per net registered ton each way (in and out); steamers exceeding 1,000 tons, but not exceeding 2,000 tons (in and out), £10; steamers under 1,000 tons *pro rata*; steamers exceeding 2,000 tons, but not exceeding 3,000 tons, £20; steamers exceeding 3,000 tons, but not exceeding 4,000 tons register (in and out), £25. Towage (inwards and outwards)—Minimum charge, £7 10s.; sailing vessels up to 100 tons register, £7 10s.; from 101 to 200 tons, £10; from 201 to 400 tons, £17; from 401 to 600 tons, £20; from 601 to 800 tons, £25; from 801 to 1,000 tons, £30; vessels over 1,000 tons and up to 1,500 tons register, £35; steamers up to 500 tons register, £12; from 501 tons to 1,000 tons, £21; from 1,001 to 2,000 tons, £24; from 2,001 to 3,000 tons, £30; from 3,001 to 4,000 tons, £36; over 4,000 tons, £40.

On page 80: *Mangaweka Settler* is published three times a week—viz., Tuesday, Thursday, and Saturday.

On page 86: Tea; Exemption—Tea grown in British dominions, except that in packets not exceeding 1 lb. in weight. See page 102.

On page 99: *Add* items as under: 537. Leather board or compo cut into shapes (see *New Zealand Gazette* of 20th August, 1903), 4d. the pound. 538. Creamalina (see *New Zealand Gazette* of 17th September, 1903), 1d. the pound. 539. Ground cocoa-shells (see *New Zealand Gazette* of 7th January, 1904), 3d. the pound. The Customs tariff is modified on and after 1st July, 1904, in respect of the undermentioned articles imported into the Cook and other Islands recently annexed (see *New Zealand Gazette* of 9th June, 1904): Claret, 2s. the gallon (in lieu of 6s. the gallon); horses, 10s. each (in lieu of £1 each); drugs imported by missionary societies for dispensation among the Natives, free.

THE

NEW ZEALAND OFFICIAL YEAR-BOOK, 1904.

PART I.—INTRODUCTORY: OFFICIAL.

NEW ZEALAND.

The Colony of New Zealand consists of three main islands, with several groups of smaller islands lying at some distance from the principal group. The main islands, known as the North, the Middle, and Stewart Islands, have a coast-line 4,330 miles in length: North Island, 2,200 miles; Middle Island, 2,000 miles; and Stewart Island, 130 miles. Other islands included within the colony are the Chatham, Auckland, Campbell, Antipodes, Bounty, and Kermadec Islands. The annexation of the Cook and sundry other islands has necessitated an enlargement of the boundaries of the colony, which will be specially treated of further on.

New Zealand is mountainous in many parts, but has, nevertheless, large plains in both North and Middle Islands. In the North Island, which is highly volcanic, is situated the famous Thermal-Springs District, of which a special account will be given. The Middle Island is remarkable for its lofty mountains, with their magnificent glaciers, and for the deep sounds or fiords on the western coast.

New Zealand is firstly a pastoral, and secondly an agricultural country. Sown grasses are grown almost everywhere, the extent of land laid down being nearly twelve millions of acres. The soil is admirably adapted for receiving these grasses, and, after the bush has been burnt off, is mostly sown over without previous ploughing. In the Middle Island a large area is covered with native grasses, all used for grazing purposes. The large extent of good grazing-land has made the colony a great wool, meat, and dairy produce country; while its agricultural capabilities are, speaking generally, very considerable. The abundance of water and the quantity of valuable timber are other natural advantages.

New Zealand is, besides, a mining country. Large deposits of coal are met with, chiefly on the west coast of the Middle Island. Gold, alluvial and in quartz, is found in both islands, the yield having been over sixty-three millions sterling in value to the present time. Full statistical information on this subject is given further on, compiled up to the latest dates.

Discovery and Early Settlement.

The first authentic account of the discovery of New Zealand is that given by Abel Jansen Tasman, the Dutch navigator. He left Batavia on the 14th August, 1642, in the yacht "Heemskirk," accompanied by the "Zeehaen" (or "Sea-hen") fly-boat. After having visited Mauritius, and discovered Tasmania, named by him "Van Diemen's Land," in honour of Anthony van Diemen, Governor of the Dutch possessions in the East Indies, he steered eastward, and on the 13th December of the same year sighted the west coast of the Middle Island of New Zealand, described by him as "a high mountainous country, which is at present marked in the charts as New Zealand."

Tasman, under the belief that the land he saw belonged to a great polar continent, and was part of the country discovered some years before by Schouten and Le Maire, to which the name of Staaten Land had been given, gave the same name of Staaten Land to New Zealand; but within about three months afterwards Schouten's "Staaten Land" was found to be merely an inconsiderable island. Upon this discovery being announced, the country that Tasman had called Staaten Land received again the name of "New Zealand," by which it has ever since been known. Tasman sailed along the coast to a bay, where he anchored. To this he gave the name of Murderers (now Massacre) Bay, on account of an unprovoked attack on a boat's crew by the natives, and the massacre of four white men. Thence he steered along the west coast of the North Island, and gave the name of Cape Maria van Diemen to the north-western extremity thereof. After sighting the islands of the Three Kings he finally departed, not having set foot in the country.

There is no record of any visit to New Zealand after Tasman's departure until the time of Captain Cook, who, after leaving the Society Islands, sailed in search of a southern continent then believed to exist. He sighted land on the 6th October, 1769, at Young Nick's Head, and on the 8th of that month cast anchor in Poverty Bay. After having coasted round the North Island and the Middle and Stewart Islands—which last he mistook for part of the Middle Island—he took his departure from Cape Farewell on the 31st March, 1770, for Australia. He visited New Zealand again in 1773, in 1774, and in 1777.

M. de Surville, a French officer in command of the vessel "Saint Jean Baptiste," while on a voyage of discovery, sighted the north-east coast of New Zealand on the 12th December, 1769, and re-

mained for a short time. A visit was soon after paid by another French officer, M. Marion du Fresne, who arrived on the west coast of the North Island of New Zealand on the 24th March, 1772, but was, on the 12th June following, treacherously murdered at the Bay of Islands by the Natives.

In 1793 the "Dædalus," under the command of Lieutenant Hanson, was sent by the Government of New South Wales to New Zealand, and two chiefs were taken thence to Norfolk Island. There was after this an occasional intercourse between the islands of New Zealand and the English settlements in New South Wales.

In 1814 the first missionaries arrived in New Zealand—Messrs. Hall and Kendall—who had been sent as forerunners by Mr. Marsden, chaplain to the New South Wales Government. After a short stay they returned to New South Wales, and on the 19th November of that year again embarked in company with Mr. Marsden, who preached his first sermon in New Zealand on Christmas Day, 1814. He returned to Sydney on the 23rd March, 1815, leaving Messrs. Hall and Kendall, who formed the first mission station at Rangihoua, Bay of Islands, under the auspices of the Church Missionary Society. Six years later, in 1821, the work of evangelization was put on a more durable basis; but the first station of the Wesleyan mission, established by Mr. Leigh and his wife, at the valley of the Kaeo, Whangaroa, was not taken possession of until the 10th June, 1823.

Colonisation.

The first attempt at colonisation was made in 1825 by a company formed in London. An expedition was sent out under the command of Captain Herd, who bought two islands in the Hauraki Gulf and a strip of land at Hokianga. The attempt, however, was a failure, owing to the savage character of the inhabitants. In consequence of frequent visits of whaling-vessels to the Bay of Islands, a settlement grew up at Kororareka—now called Russell—and in 1833 Mr. Busby was appointed British Resident there. A number of Europeans gradually settled in different parts of the country, and married Native women.

In 1838 a colonisation company, known as the New Zealand Company, was formed to establish settlement on systematic principles. A preliminary expedition, under the command of Colonel William Wakefield, was despatched from England on the 12th May, 1839, and arrived in New Zealand in the following August. Having purchased land from the Natives, Colonel Wakefield selected the shore of Port Nicholson, in Cook Strait, as the site of the first settlement. On the 22nd January, 1840, the first body of immigrants arrived, and founded the town of Wellington. About the same time—namely, on the 29th January, 1840—Captain Hobson, R.N., arrived at the Bay of Islands, empowered, with the consent of the Natives, to proclaim the sovereignty of Queen Victoria over the

islands of New Zealand, and to assume the government thereof. A compact called "The Treaty of Waitangi," to which in less than six months five hundred and twelve names were affixed, was entered into, whereby all rights and powers of sovereignty were ceded to the Queen, all territorial rights being secured to the chiefs and their tribes. New Zealand was then constituted a dependency of the Colony of New South Wales, but on the 3rd May, 1841, was proclaimed a separate colony. The seat of Government had been previously established at Waitemata (Auckland), round which a settlement was formed.

The New Zealand Company having decided to form another settlement, to which the name of "Nelson" was to be given, despatched a preliminary expedition from England in April, 1841, for the purpose of selecting a site. The spot chosen was the head of Blind Bay, where a settlement was established. About the same time a number of pioneers arrived in Taranaki, despatched thither by the New Plymouth Company, a colonising society which had been formed in England, and had bought 50,000 acres of land from the New Zealand Company.

The next important event in the progress of colonisation was the arrival at Port Chalmers, on the 23rd March, 1848, of the first of two emigrant ships sent out by the Otago Association for the foundation of a settlement by persons belonging to or in sympathy with the Free Church of Scotland.

In 1849 the "Canterbury Association for founding a Settlement in New Zealand" was incorporated. On the 16th December, 1850, the first emigrant ship despatched by the association arrived at Port Cooper, and the work of opening up the adjoining country was set about in a systematic fashion, the intention of the promoters being to establish a settlement complete in itself, and composed entirely of members of the then United Church of England and Ireland.

The Maoris.

Prior to the colonisation of New Zealand by Europeans, the earliest navigators and explorers found a race of people already inhabiting both islands. Papers written in 1874 by Mr. (afterwards Sir) William Fox, and Sir Donald McLean, then Native Minister, state that at what time the discovery of these islands was made by the Maoris, or from what place they came, are matters of tradition only, and that much has been lost in the obscurity enveloping the history of a people without letters. Nor is there anything on record respecting the origin of the Maori people themselves, beyond the general tradition of the Polynesian race, which seems to show a series of successive migrations from west to east, probably by way of Malaysia to the Pacific. Little more can now be gathered from their traditions than that they were immigrants, and that they probably found inhabitants on the east coast of the North Island belonging to the same race as themselves—the descendants of a prior migration, whose history is lost. The tradition runs

that, generations ago, the Maoris dwelt in a country named Hawaiki, and that one of their chiefs, after a long voyage, reached the northern island of New Zealand. Returning to his home with a flattering description of the country he had discovered, this chief, it is said, persuaded a number of his kinsfolk and friends, who were much harassed by war, to set out with a fleet of double canoes for the new land. The names of most of the canoes are still remembered, and each tribe agrees in its account of the doings of the people of the principal canoes after their arrival in New Zealand; and from these traditional accounts the descent of the numerous tribes has been traced. Calculations, based on the genealogical staves kept by the *tohungas*, or priests, and on the well-authenticated traditions of the people, indicate that about twenty-one generations have passed since the migration, which may therefore be assumed to have taken place about five hundred and twenty-five years ago. The position of the legendary Hawaiki is unknown, but many places in the South Seas have been thus named in memory of the motherland. The Maoris speak a very pure dialect of the Polynesian language, the common tongue, with more or less variation, in all the Eastern Pacific Islands. When Captain Cook first visited New Zealand he availed himself of the services of a native from Tahiti, whose speech was easily understood by the Maoris. In this way much information respecting the early history of the country and its inhabitants was obtained which could not have otherwise been had.

For results of recent researches as to probable origin and present numbers of the Maoris, see Year-book for 1901.

Boundaries and Area.

The Proclamation of Captain Hobson on the 30th January, 1840, gave as the boundaries of the colony the following degrees of latitude and longitude: On the north, 34° 30′ S. lat.; on the south, 47° 10′ S. lat.; on the east, 179° 0′ E. long.; on the west, 166° 5′ E. long. These limits excluded small portions of the extreme north of the North Island and of the extreme south of Stewart Island.

In April, 1842, by Royal Letters Patent, and again by the Imperial Act 26 and 27 Vict., c. 23 (1863), the boundaries of the colony were altered so as to extend from 33° to 53° of south latitude and from 162° of east longitude to 173° of west longitude. By Proclamation bearing date the 21st July, 1887, the Kermadec Islands, lying between the 29th and 32nd degrees of south latitude and the 177th and 180th degrees of west longitude, were declared to be annexed to and to become part of the Colony of New Zealand.

By Proclamation bearing date the 10th June, 1901, the Cook Group of islands, and all the other islands and territories situate within the boundary-lines mentioned in the following Schedule, were included in the Colony of New Zealand:—

A line commencing at a point at the intersection of the twenty-third degree of south latitude and the one-hundred-and-fifty-sixth degree of longitude west of Greenwich, and proceeding due north to the point of intersection of the eighth degree of south latitude and the one-hundred-and-fifty-sixth degree of longitude west of Greenwich; thence due west to the point of intersection of the eighth degree of south latitude and the one-hundred-and-sixty-seventh degree of longitude west of Greenwich; thence due south to the point of intersection of the seventeenth degree of south latitude and the one-hundred-and-sixty-seventh degree of longitude west of Greenwich; thence due west to the point of intersection of the seventeenth degree of south latitude and the one-hundred-and-seventieth degree of longitude west of Greenwich; thence due south to the point of intersection of the twenty-third degree of south latitude and the one-hundred-and-seventieth degree of longitude west of Greenwich; and thence due east to the point of intersection of the twenty-third degree of south latitude and the one-hundred-and-fifty-sixth degree of longitude west of Greenwich.

The following now constitute the Colony of New Zealand:—

1. The island commonly known as the North Island, with its adjacent islets, having an aggregate area of 44,468 square miles, or 28,459,520 acres.

2. The island known as the Middle Island, with adjacent islets, having an aggregate area of 58,525 square miles, or 37,456,000 acres.

3. Stewart Island, and adjacent islets, having an area of 665 square miles, or 425,390 acres.

4. The Chatham Islands, situate 536 miles eastward of Lyttelton in the Middle Island, with an area of 375 square miles, or 239,920 acres.

5. The Auckland Islands, about 200 miles south of Stewart Island, extending about 30 miles from north to south, and nearly 15 from east to west, the area being 210,650 acres.

6. The Campbell Islands, in latitude 52° 33′ south, and longitude 169° 8′ west, about 30 miles in circumference, with an area of 45,440 acres.

7. The Antipodes Islands, about 458 miles in a south-easterly direction from Port Chalmers, in the Middle Island. These are detached rocky islands, and extend over a distance of between 4 and 5 miles from north to south. Area, 12,960 acres.

8. The Bounty Islands, a small group of islets, thirteen in number, lying north of the Antipodes Islands, and about 415 miles in an east-south-easterly direction from Port Chalmers. Area, 3,300 acres.

9. The Kermadec Islands, a group lying about 614 miles to the north-east of Russell, in the Bay of Islands. Raoul or Sunday Island, the largest of these, is about 20 miles in circuit. The next in size is Macaulay Island, about 3 miles round. Area of the group, 8,208 acres.

10. Islands forming the Cook Group:—

Rarotonga.—Distance from Auckland, 1,638 miles; circumference, 20 miles; height, 2,920 ft.

Mangaia.—Distance from Rarotonga, 116 miles; circumference, 30 miles; height, 656 ft.

Atiu.—Distance from Rarotonga, 116 miles: circumference, 20 miles; height, 374 ft.

Aitutaki. — Distance from Rarotonga, 140 miles; circumference, 12 miles; height, 366 ft.
Mauke.—Distance from Rarotonga, 150 miles; circumference, 6 miles; height, about 60 ft.
Mitiaro.—Distance from Rarotonga, 140 miles; circumference, miles; height, about 50 ft; also,
Takutea.—Distant from Rarotonga, 125 miles.
The Herveys (*Manuae* and *Aoutu*).—Distant from Rarotonga, 120 miles.

Total area of above group, 150 square miles.

11. Islands outside the Cook Group:—

Savage or Niue.—Distance from Rarotonga, 580 miles; circumference, 40 miles; height, 200 ft.; area, about 100 square miles.
Palmerston.—Distance from Rarotonga, 273 miles; an atoll, miles by 2 miles.
Penrhyn, or *Tongareva.*—Distance 735 miles from Rarotonga; an atoll, 12 miles by 7 miles.
Humphrey, or *Manahiki.*—Distance from Rarotonga, 650 miles; an atoll, 6 miles by 5 miles.
Rierson, or *Rakaanga.*—Distance from Rarotonga, 670 miles; an atoll, 3 miles by 3 miles.
Danger, or *Pukapuka.*—Distance from Rarotonga, 700 miles; an atoll, 3 miles by 3 miles.
Suwarrow.—Distance from Rarotonga, 530 miles; an atoll.

Total area of islands outside the Cook Group, 130 square miles.

The total area of the colony is thus about 104,751 square miles, of which the aggregate area of the outlying groups of islands that are practically useless for settlement amounts to about 498 square miles.

Area of the Commonwealth States of Australia.

The areas of the several Australian States, as stated by different authorities, vary considerably. The total area of the Australian Continent is given as 2,944,628 square miles, according to a computation made by the late Surveyor-General of Victoria, Mr. J. A. Skene, from a map of Continental Australia compiled and engraved under his direction; but the following areas are taken from the latest official records of each colony:—

	Square Miles.
Queensland	668,497
New South Wales	310,700
Victoria	87,884
South Australia	903,690
Western Australia	975,920
Total, Continent of Australia	2,946,691
Tasmania	26,215
Total, Commonwealth of Australia ..	2,972,906

The size of these States (with New Zealand) may be better realised by comparison of their areas with those of European countries. The areas of the following countries—Austria-Hungary, Germany, France, Belgium, Holland, Denmark, Sweden and Norway, Portugal, Spain, Italy (including Sardinia and Sicily), Switzerland, Greece,

Roumania, Bulgaria, Servia, Eastern Roumelia, and Turkey in Europe—containing on the whole rather less than 1,600,000 square miles, amount to little more than half the extent of the Australian Continent. If the area of Russia in Europe be added to those of the other countries the total would be about one-seventh larger than the Australian Continent, and about one-twelfth larger than the Australian States, with New Zealand.

Area of the Colony of New Zealand.

The area of the Colony of New Zealand is about one-seventh less than the area of Great Britain and Ireland, the Middle Island of New Zealand being a little larger than the combined areas of England and Wales.

United Kingdom.	Area in Square Miles.
England and Wales	58,311
Scotland	30,463
Ireland	32,531
Total	121,305

New Zealand.	Area in Square Miles.
North Island	44,468
Middle Island	58,525
Stewart Island	665
Chatham Islands	375
Other islands	718
Total	104,751

Physical Features of the North Island.

The North Island extends over a little more than seven degrees of latitude, a distance in a direct line from north to south of 430 geographical or 498 statute miles; but, as the northern portion of the colony, which covers more than three degrees of latitude, trends to the westward, the distance in a straight line from the North Cape to Cape Palliser, the extreme northerly and southerly points of the island, is about 515 statute miles.

This island is, as a whole, hilly, and, in parts, mountainous in character, but there are large areas of plain or comparatively level country that are, or by clearing may be made, available for agricultural purposes. Of these, the principal are the plains in Hawke's Bay on the East Coast, the Wairarapa Plain in the Wellington District, and a strip of country along the West Coast, about 250 miles in length, extending from a point about thirty miles from the City of Wellington to a little north of New Plymouth. The largest plain in the North Island, Kaingaroa, extends from the shore of Lake Taupo in a north-north-easterly direction to the sea-coast in the Bay of Plenty; but a great part of it is covered with pumice-sand, and is unfit for tillage or pasture. There are several smaller plains and numerous valleys suitable for agriculture. The level o

undulating country in this island fit, or capable of being made fit, for agriculture has been roughly estimated at 13,000,000 acres. This includes lands now covered with standing forest, and swamps that can be drained; also large areas of clay-marl and pumice-covered land. The clay-marl in its natural state is cold and uninviting to the farmer, but under proper drainage and cultivation it can be brought to a high state of productiveness. This kind of land is generally neglected at the present time, as settlers prefer soils more rapidly remunerative and less costly to work. The larger portion of the North Island was originally covered with forest. Although the area of bush-land is still very great, yet year by year the amount is being reduced, chiefly to meet the requirements of settlement, the trees being cut down and burnt, and grass-seed sown on the ashes to create pasture. Hilly as the country is, yet from the nature of the climate it is especially suited for the growth of English grasses, which will flourish wherever there is any soil, however steep the land may be; once laid down in grass very little of the land is too poor to supply food for cattle and sheep. The area of land in the North Island deemed purely pastoral or capable of being made so, while too steep for agricultural purposes, is estimated at 14,200,000 acres. In the centre of the island is a lake, about twenty miles across either way, called Taupo. A large area adjacent to the lake is at present worthless pumice-country. The Waikato River, the largest in the North Island, flows out of the north-eastern corner of this lake, and runs thence north-westward until it enters the ocean a little distance south of the Manukau Harbour. This river is navigable for small steamers for about a hundred miles from its mouth. The Maori King-country, occupied by Natives who for several years isolated themselves from Europeans, lies between Lake Taupo and the western coast. The River Thames, or Waihou, having its sources north of Lake Taupo, flows northward into the Firth of Thames. It is navigable for about fifty miles, but only for small steamers. The other navigable rivers in this island are the Wairoa (Kaipara), the Wanganui, and the Manawatu, the two last of which flow towards the south-west into Cook Strait.

The mountains in the North Island are estimated to occupy about one-tenth of the surface, and do not exceed 4,000ft. in height, with the exception of a few volcanic mountains that are more lofty. Of these, the three following are the most important:—

1. The Tongariro Mountain, situated to the southward of Lake Taupo. It consists of a group of distinct volcanic cones, the lava-streams from which have so overlapped in their descent as to form one compact mountain-mass at the base. The highest of these cones is called Ngauruhoe, and attains an elevation of 7,515ft. The craters of Ngauruhoe, the Red Crater (6,140ft.), and Te Mari (4,990ft.) are the three vents from which the latest discharges of lava have taken place, the most recent having occurred in 1868. These craters are still active, steam and vapour issuing from them

with considerable force and noise, the vapours, charged with pungent gases and acids, making it dangerous to approach too near the crater-lips.

2. Ruapehu. This mountain lies to the south of Ngauruhoe and Tongariro. It is a volcanic cone in the solfatara stage, and reaches the height of 9,008ft., being in part considerably above the line of perpetual snow. The most remarkable feature of this mountain is the crater-lake on its summit, which is subject to slight and intermittent eruptions, giving rise to vast quantities of steam. Recently —in March, 1895—such an eruption took place, forming a few hot springs on the margin of the lake, and increasing the heat in the lake itself. This lake lies at the bottom of a funnel-shaped crater, the steep sides of which are mantled with ice and snow. The water occupies a circular basin about 500ft. in diameter, some 300ft. below the enclosing peaks, and is quite inaccessible except by the use of ropes. This lake, and the three craters previously mentioned on Tongariro, are all in one straight line, which, if produced, would pass through the boiling springs at Tokaanu on the southern margin of Lake Taupo, the volcanic country north-east of that lake, and White Island, an active volcano in the Bay of Plenty, situated about twenty-seven miles from the mainland.

3. Mount Egmont. This is an extinct volcanic cone, rising to a height of 8,260ft. The upper part is always covered with snow. This mountain is situated close to New Plymouth, and is surrounded by one of the most fertile districts in New Zealand. Rising from the plains in solitary grandeur, it is an object of extreme beauty, the cone being one of the most perfect in the world.

It is estimated that the area of mountain-tops and barren country at too high an altitude for sheep, and therefore worthless for pastoral purposes, amounts, in the North Island, to 300,000 acres.

Without a doubt the hot springs form the most remarkable feature of the North Island. They are found over a large area, extending from Tongariro, south of Lake Taupo, to Ohaeawai, in the extreme north—a distance of some 300 miles; but the principal seat of hydrothermal action appears to be in the neighbourhood of Lake Rotorua, about forty miles north-north-east from Lake Taupo. By the destruction of the famed Pink and White Terraces and of Lake Rotomahana during the eruption of Mount Tarawera on the 10th June, 1886, the neighbourhood has been deprived of attractions unique in character and of unrivalled beauty; but the natural features of the country—the numerous lakes, geysers, and hot springs, some of which possess remarkable curative properties in certain complaints—are still very attractive to tourists and invalids. The world-wide importance of conserving this region as a sanatorium for all time has been recognised by the Government, and it is now dedicated by Act of Parliament to that purpose.

Notwithstanding the length of coast-line, good harbours in the North Island are not numerous. Those on the west coast north of New Plymouth are bar-harbours, unsuitable for large vessels. The

principal harbours are the Waitemata Harbour, on which Auckland is situated—this is rather a deep estuary than a harbour; several excellent havens in the northern peninsula; and Port Nicholson, on the borders of which Wellington is situated. This is a land-locked harbour, about six miles across, having a comparatively narrow but deep entrance from the ocean. The water is deep nearly throughout.

The Cape Colville Peninsula is rich in gold-bearing quartz.

Cook Strait.

Cook Strait separates the North and Middle Islands. It is some sixteen miles across at its narrowest part, but in the widest about ninety. The strait is invaluable for the purpose of traffic between different parts of the colony.

Physical Features of the Middle Island.

The extreme length of the Middle Island, from Jackson's Head, in Cook Strait, to Puysegur Point, at the extreme south-west, is about 525 statute miles; the greatest distance across at any point is in Otago (the southernmost) District, about 180 miles.

The Middle Island is intersected along almost its entire length by a range of mountains known as the Southern Alps. Some of the summits reach a height of from 10,000ft. to 12,000ft., Mount Cook, the highest peak, rising to 12,349ft.

In the south, in the neighbourhood of the sounds and Lake Te Anau, there are many magnificent peaks, which, though not of great height, are, owing to their latitude, nearly all crowned with perpetual ice and snow. Further north the mountains increase in height—Mount Earnslaw, at Lake Wakatipu; and Mount Aspiring, which has been aptly termed the New Zealand Matterhorn, 9,949 ft. in height, at Lake Wanaka. Northward of this again are Mount Cook (or Aorangi), Mount Sefton, and other magnificent peaks.

For beauty and grandeur of scenery the Southern Alps of New Zealand may worthily compare with, while in point of variety they are said actually to surpass, the Alps of Switzerland. In New Zealand few of the mountains have been scaled; many of the peaks and most of the glaciers are as yet unnamed; and there is still, in parts of the Middle Island, a fine field for exploration and discovery—geographical, geological, and botanical. The wonders of the Southern Alps are only beginning to be known; but the more they are known the more they are appreciated. The snow-line in New Zealand being so much lower than in Switzerland, the scenery, though the mountains are not quite so high, is of surpassing grandeur.

There are extensive glaciers on both sides of the range, those on the west being of exceptional beauty, as, from the greater abruptness of the mountain-slopes on that side, they descend to within about 700ft. of the sea-level, and into the midst of the evergreen forest. The largest glaciers on either side of the range are easily accessible.

The following gives the sizes of some of the glaciers on the eastern slope :—

Name.	Area of Glacier.	Length of Glacier.	Greatest Width.	Average Width.
	Acres.	Miles ch.	Miles ch.	Miles ch.
Tasman	13,664	18 0	2 14	1 15
Murchison	5,800	10 70	1 5	0 66
Godley	5,312	8 0	1 55	1 3
Mueller	3,200	8 0	0 61	0 50
Hooker	2,416	7 25	0 54	0 41

The Alletsch Glacier in Switzerland, according to Ball, in the "Alpine Guide," has an average width of one mile. It is in length and width inferior to the Tasman Glacier.

Numerous sounds or fiords penetrate the south-western coast. They are long, narrow, and deep (the depth of water at the upper part of Milford Sound is 1,270ft., although at the entrance only 130ft.), surrounded by giant mountains clothed with foliage to the snow-line, with waterfalls, glaciers, and snowfields at every turn. Some of the mountains rise almost precipitously from the water's edge to 5,000ft. and 6,000ft. above the sea. Near Milford, the finest of these sounds, is the great Sutherland Waterfall, 1,904ft. high.

The general surface of the northern portion of the Middle Island, comprising the Provincial Districts of Nelson and Marlborough, is mountainous, but the greater part is suitable for grazing purposes. There are some fine valleys and small plains suitable for agriculture, of which the Wairau Valley or Plain is the largest. Deep sounds, extending for many miles, break the coast-line abutting on Cook Strait. The City of Nelson is situated at the head of Blind Bay, which has a depth inwards from Cook Strait of about forty statute miles.

The Provincial District of Canterbury lies to the south of the Marlborough District, and on the eastern side of the island. Towards the north the land is undulating; then there is a stretch of almost perfectly level country extending towards the south-west 160 miles, after which, on the south, the country is undulating as far as the borders of the Otago District. On the east a block of hill-country rises abruptly from the plain and extends for some miles seaward. This is Banks Peninsula, containing several good harbours, the principal being Port Cooper, on the north, on which is situated Lyttelton, the chief port of the district: the harbour of Akaroa, one of the finest in the colony, is on the southern coast of this peninsula.

The District of Otago is, on the whole, mountainous, but has many fine plains and valleys suitable for tillage. The mountains, except towards the west coast, are generally destitute of timber, and suitable for grazing sheep. There are goldfields of considerable

extent in the interior of this district. The inland lakes are also very remarkable features. Lake Wakatipu extends over fifty-four miles in length, but its greatest width is not more than four miles, and its area only 114 square miles. It is 1,070ft. above sea-level, and has a depth varying from 1,170ft. to 1,296ft. Te Anau Lake is somewhat larger, having an area of 132 square miles. These lakes are bounded on the west by broken, mountainous, and wooded country, extending to the ocean.

The chief harbours in Otago are Port Chalmers, at the head of which Dunedin is situated, and the Bluff Harbour, at the extreme south.

The District of Westland, extending along the west coast of the Middle Island, abreast of Canterbury, is more or less auriferous throughout. The western slopes of the central range of mountains are clothed with forest-trees to the snow-line; but on the eastern side timber is scarce, natural grasses covering the ground.

The rivers in the Middle Island are for the most part mountain torrents, fed by glaciers in the principal mountain ranges. When the snow melts they rise in flood, forming, where not confined by rocky walls, beds of considerable width, generally covered by enormous deposits of shingle. The largest river in the colony as regards volume of water is the Clutha. It is 154 miles in length, but is only navigable for boats or small river-steamers for about thirty miles. The Rivers Buller, Grey, and Hokitika, on the West Coast, are navigable for a short distance from their mouths. They form the only ports in the Westland District. In their unimproved state they admitted, owing to the bars at their mouths, none but vessels of small draught; but, in consequence of the importance of the Grey and Buller Rivers as the sole ports available for the coal-export trade, large harbour-works have been undertaken, resulting in the deepening of the beds of these rivers, and giving a depth of from 18ft. to 26ft. of water on the bar.

The area of level or undulating land in the Middle Island available for agriculture is estimated at about 15,000,000 acres. About 13,000,000 are suitable for pastoral purposes only, or may become so when cleared of forest and sown with grass-seed. The area of barren land and mountain-tops is estimated at about 9,000,000 acres.

Stewart Island.

Foveaux Strait separates the Middle from Stewart Island. This last island has an area of only 425,390 acres.

Stewart Island is a great tourist resort during the summer months, and is easily reached by steamer from the Bluff, distant about 25 miles.

The principal peak is Mount Anglem, 3,200 ft. above sea-level, which has an extinct crater at its summit. Most of the island is rugged and forest-clad; the climate is mild, frost being seldom experienced; and the soil, when cleared of bush, is fertile.

The chief attractions are the numerous bays and fiords. Paterson Inlet is a magnificent sheet of water, about ten miles by four miles, situated close to Half-moon Bay, the principal port, where over two hundred people live. Horse-shoe Bay and Port William are within easy reach of Half-moon Bay. Port Pegasus, a land-locked sheet of water about eight miles by a mile and a half, is a very fine harbour. At "The Neck" (Paterson Inlet) there is a Native settlement of over a hundred Maoris and half-castes. The bush is generally very dense, with thick undergrowth. Rata, black-pine, white-pine, miro, and totara are the principal timber trees. Fish are to be had in great abundance and variety; oysters form an important industry. Wild pigeons, ducks, and mutton-birds are plentiful.

The Outlying Islands.

The outlying group of the Chatham Islands, 480 statute miles east-south-east from Wellington, and 536 miles eastward of Lyttelton, consists of two principal islands and several unimportant islets. The largest island contains about 222,490 acres, of which an irregular-shaped lake or lagoon absorbs 45,960 acres. About one quarter of the surface of the land is covered with forest, the rest with fern or grass. The hills nowhere rise to a great height. Pitt Island is the next in size; the area is 15,330 acres. The greater portion of both islands is used for grazing sheep.

The Kermadec Group of islands, four in number, is situated between 29° 10′ and 31° 30′ south latitude, and between 177° 45′ and 179° west longitude. They are named Raoul or Sunday Island, Macaulay Island, Curtis Islands, and L'Espérance or French Rock. The principal island, Sunday, is 600 miles distant from Auckland. The islands are volcanic, and in two of them signs of activity are still to be seen. The rainfall is plentiful, but not excessive. The climate is mild and equable, and slightly warmer than the north of New Zealand. The following are the areas of the islands and islets of the group: Sunday Island, 7,200 acres; Herald group of islets, 85 acres; Macaulay Island, 764 acres; Curtis Islands, 128 acres and 19 acres; L'Espérance, 12 acres: total, 8,208 acres. Sunday Island is twenty miles in circumference, roughly triangular in shape, and at the highest point 1,723ft. above the sea-level. It is rugged and broken over a very large extent of its surface, and, except in a few places, covered with forest. The soil everywhere on the island is very rich, being formed by the decomposition of a dark-coloured pumiceous tuff and a black andesitic lava, with which is closely mixed a fine vegetable mould. The great luxuriance and richness of the vegetation bear witness to the excellence of the soil, which is everywhere—except where destroyed by eruptions, and on the steep cliffs—the same rich loam. Want of water is one of the drawbacks. Three of the four lakes on the island are fresh, but so difficult of approach as to be practically useless.

The Auckland Islands are about 290 miles south of Bluff Harbour, their position being given on the Admiralty chart as latitude

50° 31′ 29″ S., and longitude 166° 19′ 12″ E. They have several good harbours. Port Ross, at the north end of the principal island, was described by the eminent French commander, D'Urville, as one of the best harbours of refuge in the known world. At the southern end of the island there is a through passage extending from the east to the west coast. It has been variously named Adams Strait and Carnley Harbour, and forms a splendid sheet of water. The largest of the islands is about 27 miles long by about 15 miles broad, and is very mountainous, the highest part being about 2,000ft. above the sea. The west coast is bold and precipitous, but the east coast has several inlets. The wood on the island is, owing to the strong prevailing wind, scrubby in character. The New Zealand Government maintains at this island a dépôt of provisions and clothing for the use of shipwrecked mariners.

The Cook Islands, with others recently annexed, are as under*:—

Rarotonga (Cook Group): A magnificent island, rising to a height of 3,000 ft., clothed to the tops of the mountains with splendid vegetation. It has abundant streams, considerable tracts of sloping land, and rich alluvial valleys. The two harbours are poor.

Mangaia, the south-easternmost of the Cook Group, is of volcanic origin, and about thirty miles in circumference. The productions, which are numerous and cheap, are obtained by assiduous labour.

Atiu (Cook Group) resembles Mangaia in appearance and extent. It is a mere bank of coral, 10 ft. or 12 ft. high, steep and rugged, except where there are small sandy beaches and some clefts, where the ascent is gradual.

Aitutaki (Cook Group) presents a most fruitful appearance, its shores being bordered by flat land, on which are innumerable cocoanut and other trees, the higher ground being beautifully interspersed with lawns. It is eighteen miles in circuit.

Mauke or Parry Island (Cook Group) is a low island; it is about two miles in diameter, well wooded, and inhabited.

Mitiaro (Cook Group) is a low island, from three to four miles long and one mile wide.

Hervey Islands (Cook Group): This group consists of three islands, surrounded by a reef, which may be six leagues in circumference.

Niue, or Savage Island, lying east of the Friendly Islands, is a coral island, thirty-six miles in circumference, rising to a height of 200 ft. It has the usual tropical productions.

Palmerston Island, lying about 500 miles east of Niue and about 220 from the nearest island of the Cook Group (Aitutaki), is remarkable as the "San Pablo" of Magellan, the first island discovered in the South Sea. It has no harbour. The soil is fairly fertile, and there is some good hardwood timber.

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* A special article fully descriptive of these annexed islands was given in the Year-book for 1902, and again in that for 1903.

Penrhyn Island (Tongareva) lies about 300 miles north-east of Manahiki. It is one of the most famous pearl islands in the Pacific, and there is a splendid harbour, a lagoon with two entrances, fit for ships of any size.

Manahiki, lying about 400 miles eastward of Danger Island, is an atoll, about thirty miles in circumference, valuable from the extent of the cocoanut groves. The interior lagoon contains a vast deposit of pearl-shell.

Rakaanga is an atoll, three miles in length and of equal breadth.

Danger Island (Pukapuka): Next to the 10th parallel, but rather north of the latitude of the Navigators, and east of them are a number of small atolls. Of these, the nearest to the Samoan Group—about 500 miles—is Danger Island, bearing north-west of Suwarrow about 250 miles.

Suwarrow Island has one of the best harbours in the Pacific. It lies about 500 miles east of Apia, the capital of the Samoan Group. It is a coral atoll, of a triangular form, fifty miles in circumference, the reef having an average width of half a mile across, enclosing a land-locked lagoon twelve miles by eight, which forms an excellent harbour. The entrance is half a mile wide, and the accommodation permits of ships riding in safety in all weathers, with depths of from three to thirty fathoms. It is out of the track of hurricanes, uninhabited, but capable by its fertility of supporting a small population. As a depot for the collection of trade from the various islands it ought to be very valuable.

Constitution.

British sovereignty was proclaimed over New Zealand in January, 1840, and the country became a dependency of New South Wales until the 3rd May, 1841, when it was made a separate colony. The seat of Government was at Auckland, and the Executive included the Governor, and three gentlemen holding office as Colonial Secretary, Attorney-General, and Colonial Treasurer.

The successors of these gentlemen, appointed in August, 1841, May, 1842, and January, 1844, respectively, continued in office until the establishment of Responsible Government on the 7th May, 1856. Only one of them—Mr. Swainson, the Attorney-General—sat as a member of the first General Assembly, opened on the 27th May, 1854. During the session of that year there were associated with the permanent members of the Executive Council certain members of the General Assembly. These latter held no portfolios.

The Government of the colony was at first vested in the Governor, who was responsible only to the Crown; but in 1852 an Act granting representative institutions to the colony was passed by the Imperial Legislature. Under it the constitution of a General Assembly for the whole colony was provided for, to consist of a Legislative Council, the members of which were to be nominated by the Governor, and of an elective House of Representa-

tives. The first session of the General Assembly was opened on the 27th May, 1854, but the members of the Executive were not responsible to Parliament. The first Ministers under a system of Responsible Government were appointed in the year 1856. By the Act of 1852 the colony was divided into six provinces, each to be presided over by an elective Superintendent, and to have an elective Provincial Council, empowered to legislate, except on certain specified subjects. The franchise amounted practically to household suffrage. In each case the election was for four years, but a dissolution of the Provincial Council by the Governor could take place at any time, necessitating a fresh election both of the Council and of the Superintendent. The Superintendent was chosen by the whole body of electors of the province; each member of the Provincial Council by the electors of a district. The Provincial Governments, afterwards increased to nine, remained as integral parts of the Constitution of the colony until the 1st November, 1876, when they were abolished by an Act of the General Assembly, that body having been vested with the power of altering the Constitution Act. On the same day an Act of the General Assembly which subdivided the colony (exclusive of the areas included within municipalities) into counties, and established a system of local county government, came into force.

Government.

The Governor is appointed by the King. His salary is £5,000 a year, with an annual allowance of £1,500 on account of his estatablishment, and of £500 for travelling-expenses, provided by the colony.

Members of the Legislative Council hold their seats under writs of summons from the Governor. Till the year 1891 the appointments were for life; but in September of that year an Act was passed making appointments after that time tenable for seven years only, though Councillors may be reappointed. In either case seats may be vacated by resignation or extended absence. Two members of the Council are aboriginal native chiefs.

The members of the House of Representatives are elected for three years from the time of each general election; but at any time a dissolution of Parliament by the Governor may render a general election necessary. Four of the members are representatives of Native constituencies. For the purposes of European representation the colony is divided into sixty-eight electoral districts, four of which—the Cities of Auckland, Wellington, Christchurch, and Dunedin—return each three members, and all the other electorates one each, a total of seventy-six.* The full number of members composing the House of Representatives is thus eighty. Members of the House of Representatives are chosen by the votes of the in-

* But after the expiry of the present Parliament, these four city electorates will become twelve single electorates, and there will be as many districts as there are members (excluding Maoris). The change was effected by the City Single Electorates Act passed in 1903.

habitants in every electoral district appointed for that purpose. No person, who, being a bankrupt within the meaning of "The Bankruptcy Act, 1892," has not obtained an order of discharge under that Act shall be qualified to be nominated as a candidate for election, or to be elected, or to take his seat as a member of the House of Representatives, anything in any other Act to the contrary notwithstanding.

In 1889 an amendment of the Representation Act was passed, which contained a provision prohibiting any elector from giving his vote in respect of more than one electorate at any election. "The Electoral Act, 1893," extended to women of both races the right to register as electors, and to vote at the elections for members of the House of Representatives. The qualification for registration is the same for both sexes. No person is entitled to be registered on more than one electoral roll within the colony. Women are not qualified to be elected as members of the House of Representatives. The electoral laws are the subject of special comment further on in this work. Every man registered as an elector, and not specially excepted by the Electoral Act now in force, is qualified to be elected a member of the House of Representatives for any electoral district. For European representation every adult person, if resident one year in the colony and three months in one electoral district, can be registered as an elector. Freehold property of the value of £25 held for six months preceding the day of registration until 1896 entitled a man or woman to register, if not previously registered under the residential qualification. But the Amendment Act of 1896 abolished the property qualification (except in case of existing registrations), and residence alone now entitles a man or woman to have his or her name placed upon an electoral roll. For Maori representation every adult Maori resident in any Maori electoral district (of which there are four only in the colony) can vote. Registration is not required in Native districts. [The above provisions are now incorporated in "The Electoral Act, 1902," which consolidates the electoral laws, with such amendments as were found necessary.]

The Seat of Government.

Up to the year 1865 the seat of Government of New Zealand was at Auckland. Several attempts were made by members of Parliament, by motions in the Legislative Council and House of Representatives, to have it removed to some more central place; but it was not until November, 1863, that Mr. Domett (the then ex-Premier) was successful in carrying resolutions in the House of Representatives that steps should be taken for appointing some place in Cook Strait as the permanent seat of Government in the colony. The resolutions adopted were: "(1.) That it has become necessary that the seat of Government in the colony should be transferred to some suitable locality in Cook Strait. (2.) That, in order to promote the accomplishment of this object, it is desirable

that the selection of the particular site in Cook Strait should be left to the arbitrament of an impartial tribunal. (3.) That, with this view, a Bill should be introduced to give effect to the above resolutions." On the 25th November an address was presented to the Governor, Sir George Grey, K.C.B., by the Commons of New Zealand, requesting that the Governors of the Colonies of New South Wales, Victoria, and Tasmania, might each be asked to appoint one Commissioner for the purpose of determining the best site in Cook Strait. Accordingly, the Hon. Joseph Docker, M.L.C., New South Wales; the Hon. Sir Francis Murphy, Speaker of the Legislative Council, Victoria; and R. C. Gunn, Esq., Tasmania, were appointed Commissioners.

These gentlemen, having made a personal inspection of all suitable places, arrived at the unanimous decision "that Wellington, in Port Nicholson, was the site upon the shores of Cook Strait which presented the greatest advantages for the administration of the government of the colony."

The seat of Government was, therefore, in accordance with the recommendation of the Commissioners, removed to Wellington in February, 1865.

Public Works.

Nearly all the public works of New Zealand are in the hands of the Government of the colony, and in the early days they simply kept pace with the spread of settlement. In 1870, however, a great impetus was given to the progress of the whole country by the inauguration of the "Public Works and Immigration Policy," which provided for carrying out works in advance of settlement. Railways, roads, and water-races were constructed, and immigration was conducted on a large scale. As a consequence, the population increased from 267,000 in 1871 to 501,000 in 1881, and to 832,505 in December, 1903; besides whom there were 43,143 Maoris, and also 12,292 persons residing in the Cook and other Pacific Islands recently annexed to the colony.

SUCCESSIVE GOVERNORS.

Succession of Governors of New Zealand, and the Dates on which they assumed and retired from the Government.

Captain William Hobson, R.N., from Jan., 1840, to 10 Sept., 1842.

[British sovereignty was proclaimed by Captain Hobson in January, 1840, and New Zealand became a dependency of the Colony of New South Wales until 3rd May, 1841, at which date it was proclaimed a separate colony. From January, 1840, to May, 1841, Captain Hobson was Lieutenant-Governor of New Zealand under Sir George Gipps, Governor of New South Wales, and from May, 1841, Governor of New Zealand; the seat of Government being at Auckland, where he died in September, 1842. From the time of Governor Hobson's death, in September, 1842, until the arrival of Governor Fitzroy, in December, 1843, the Government was carried on by the Colonial Secretary, Lieutenant Shortland.]

Lieutenant Shortland, Administrator, from 10 Sept., 1842, to 26 Dec., 1843.

Captain Robert Fitzroy, R.N., from 26 Dec., 1843, to 17 Nov., 1845.

Captain Grey (became Sir George Grey, K.C.B., in 1848), from 18 Nov., 1845, to 31 Dec., 1853.

[Captain Grey held the commission as Lieutenant-Governor of the colony until the 1st January, 1848, when he was sworn in as Governor-in-Chief over the Islands of New Zealand, and as Governor of the Province of New Ulster and Governor of the Province of New Munster. After the passing of the New Zealand Constitution Act, Sir George Grey was, on the 13th September, 1852, appointed Governor of the colony, the duties of which office he assumed on the 7th March, 1853. In August, 1847, Mr. E. J. Eyre was appointed Lieutenant-Governor of New Munster: he was sworn in, 28th January, 1848. On 3rd January, 1848, Major-General George Dean Pitt was appointed Lieutenant-Governor of New Ulster: he was sworn in, 14th February, 1848; died, 8th January, 1851; and was succeeded as Lieutenant-Governor by Lieutenant-Colonel Wynyard, appointed 14th April, 1851; sworn in, 26th April, 1851. The duties of the Lieutenant-Governor ceased on the assumption by Sir George Grey of the office of Governor, on the 7th March, 1853.]

Lieutenant-Colonel Robert Henry Wynyard, C.B., Administrator, from 3 Jan., 1854, to 6 Sept., 1855.

Colonel Thomas Gore Browne, C.B., from 6 Sept., 1855, to 2 Oct., 1861.

Sir George Grey, K.C.B., Administrator, from 3 Oct., 1861; Governor, from 4 Dec., 1861, to 5 Feb., 1868.

Sir George Ferguson Bowen, G.C.M.G., from 5 Feb., 1868, to 19 Mar., 1873.

Sir George Alfred Arney, Chief Justice, Administrator, from 21 Mar. to 14 June, 1873.

Sir James Fergusson, Baronet, P.C., from 14 June, 1873, to 3 Dec., 1874.

The Marquis of Normanby, P.C., G.C.M.G., Administrator, from 3 Dec., 1874; Governor, from 9 Jan., 1875, to 21 Feb., 1879.

James Prendergast, Esquire, Chief Justice, Administrator, from 21 Feb. to 27 Mar., 1879.

Sir Hercules George Robert Robinson, G.C.M.G., Administrator, from 27 Mar., 1879; Governor, from 17 April, 1879, to 8 Sept., 1880.

James Prendergast, Esquire, Chief Justice, Administrator, from 9 Sept. to 29 Nov., 1880.

The Honourable Sir Arthur Hamilton Gordon, G.C.M.G., from 29 Nov., 1880, to 23 June, 1882.

Sir James Prendergast, Chief Justice, Administrator, from 24 June, 1882, to 20 Jan., 1883.

Lieutenant-General Sir William Francis Drummond Jervois, G.C.M.G., C.B., from 20 Jan., 1883, to 22 Mar., 1889.

Sir James Prendergast, Chief Justice, Administrator, from 23 Mar. to 2 May, 1889.

The Earl of Onslow, G.C.M.G., from 2 May, 1889, to 24 Feb., 1892.
Sir James Prendergast, Chief Justice, Administrator, from 25 Feb., to 6 June, 1892.
The Earl of Glasgow, G.C.M.G., from 7 June, 1892, to 6 Feb., 1897.
Sir James Prendergast, Chief Justice, Administrator, from 8 Feb., 1897, to 9th Aug., 1897.
The Earl of Ranfurly, G.C.M.G., from 10th Aug., 1897.

SUPREME COURT JUDGES.

SUPREME COURT JUDGES, PAST AND PRESENT, WITH DATES OF APPOINTMENT, AND OF RESIGNATION OR DEATH.

Sir W. Martin, appointed Chief Justice, 10 Jan., 1842. Resigned, 12 June, 1857.
H. S. Chapman, appointed, 26 Dec., 1843. Resigned, 30 July, 1850. Reappointed, 23 Mar., 1864. Resigned, 31 Mar., 1875.
S. Stephen, appointed, 30 July, 1850. Appointed Acting Chief Justice, 20 Oct., 1855. Died, 13 Jan., 1858.
Daniel Wakefield, appointed, Oct., 1855. Died, Oct., 1857.
Hon. H. B. Gresson, appointed temporarily, 8 Dec., 1857. Permanently, 1 July, 1862. Resigned, 31 Mar., 1875.
Sir G. A. Arney, appointed Chief Justice, 1 Mar., 1858. Resigned 31 Mar., 1875.
A. J. Johnston, appointed, 2 Nov., 1858. Died, 1 June, 1888.
C. W. Richmond, appointed, 20 Oct., 1862. Died, 3 Aug., 1895.
J. S. Moore, appointed temporarily, 15 May, 1866. Relieved, 30 June, 1868.
C. D. R. Ward, appointed temporarily, 1 Oct., 1868. Relieved, May, 1870. Appointed temporarily, 21 Sept., 1886. Relieved, 12 Feb., 1889.
Sir J. Prendergast, appointed Chief Justice, 1 April, 1875. Resigned, 25 May, 1899.
T. B. Gillies, appointed, 3 Mar., 1875. Died, 26 July, 1889.
J. S. Williams, appointed, 3 Mar., 1875.
J. E. Denniston, appointed, 11 Feb., 1889.
E. T. Conolly, appointed, 19 Aug., 1889. Resigned, 9 Sept., 1903.
Hon. Sir P. A. Buckley, K.C.M.G., appointed, 20 Dec., 1895. Died, 18 May, 1896.
W. B. Edwards, appointed, 11 July, 1896.
F. W. Pennefather, appointed temporarily, 25 April, 1898. Resigned, 24 April, 1899.
Hon. Sir Robert Stout, K.C.M.G., appointed Chief Justice, 22 June, 1899.
J. C. Martin, acting Judge, appointed, 12 April, 1900. Resigned, 4 Dec., 1900.
Theophilus Cooper, appointed, 21 Feb., 1901.
F. R. Chapman, appointed, 11 Sept., 1903.

EXECUTIVE COUNCIL, 1843–56.

MEMBERS OF THE EXECUTIVE COUNCIL OF THE COLONY OF NEW ZEALAND PREVIOUS TO THE ESTABLISHMENT OF RESPONSIBLE GOVERNMENT (NOT INCLUDING THE OFFICERS COMMANDING THE FORCES).

Willoughby Shortland, Colonial Secretary, from 3 May, 1841, to 31 Dec., 1843; succeeded by Mr. Sinclair.

Francis Fisher, Attorney-General, from 3 May to 10 Aug., 1841; succeeded by Mr. Swainson.

George Cooper, Colonial Treasurer, from 3 May, 1841, to 9 May, 1842; succeeded by Mr. Shepherd.

William Swainson, Attorney-General, from 10 Aug., 1841, to 7 May, 1856.

Alexander Shepherd, Colonial Treasurer, from 9 May, 1842, to 7 May, 1856.

Andrew Sinclair, Colonial Secretary, from 6 Jan., 1844, to 7 May, 1856.

[The three gentlemen last mentioned were nominated by Her late Majesty as *ex officio* members of the Executive Council. Two of them, the Colonial Secretary and the Colonial Treasurer, were not members of the General Assembly, opened for the first time 27th May, 1854, but all three remained in office until the establishment of Responsible Government.]

James Edward FitzGerald, M.H.R., without portfolio, from 14 June to 2 Aug., 1854.

Henry Sewell, M.H.R., without portfolio, from 14 June to 2 Aug., 1854.

Frederick Aloysius Weld, M.H.R., without portfolio, from 14 June to 2 Aug., 1854.

Francis Dillon Bell, M.L.C., without portfolio, from 30 June to 11 July, 1854.

Thomas Houghton Bartley, M.L.C., without portfolio, from 14 July to 2 Aug., 1854.

Thomas Spencer Forsaith, M.H.R., without portfolio, from 31 Aug. to 2 Sept., 1854.

Edward Jerningham Wakefield, M.H.R., without portfolio, from 31 Aug. to 2 Sept., 1854.

William Thomas Locke Travers, M.H.R., without portfolio, 31 Aug. to 2 Sept., 1854.

James Macandrew, M.H.R., without portfolio, from 31 Aug. to 2 Sept., 1854.

PARLIAMENTS.

NUMBER OF PARLIAMENTS SINCE THE CONSTITUTION ACT PASSED FOR CONFERRING REPRESENTATIVE INSTITUTIONS UPON THE COLONY OF NEW ZEALAND, WITH THE DATES OF OPENING AND CLOSING OF SESSIONS AND DATES OF DISSOLUTION.

Parliament.	Date of Opening of Sessions.	Date of Prorogation.
First (dissolved 15th September, 1855)	27 May, 1854 ..	9 August, 1854.
	31 August, 1854 ..	16 September, 1854.
	8 August, 1855 ..	15 September, 1855.
Second (dissolved 5th November, 1860)	15 April, 1856 ..	16 August, 1856.
	(No session in 1857)	
	10 April, 1858 ..	21 August, 1858.
	(No session in 1859)	
	30 July, 1860 ..	5 November, 1860.
Third (dissolved 27th January, 1866)	3 June, 1861 ..	7 September, 1861.
	7 July, 1862 ..	15 September, 1862.
	19 October, 1863 ..	14 December, 1863.
	24 November, 1864	13 December, 1864.
	26 July, 1865 ..	30 October, 1865.
Fourth (dissolved 30th December, 1870)	30 June, 1866 ..	8 October, 1866.
	9 July, 1867 ..	10 October, 1867.
	9 July, 1868 ..	20 October, 1868.
	1 June, 1869 ..	3 September, 1869.
	14 June, 1870 ..	13 September, 1870.
Fifth (dissolved 6th December, 1875)	14 August, 1871 ..	16 November, 1871.
	16 July, 1872 ..	25 October, 1872.
	15 July, 1873 ..	3 October, 1873.
	3 July, 1874 ..	31 August, 1874.
	20 July, 1875 ..	21 October, 1875.
Sixth (dissolved 15th August, 1879)	15 June, 1876 ..	31 October, 1876.
	19 July, 1877 ..	10 December, 1877.
	26 July, 1878 ..	2 November, 1878.
	11 July, 1879 ..	11 August, 1879.
Seventh (dissolved 8th November, 1881)	24 September, 1879	19 December, 1879.
	28 May, 1880 ..	1 September, 1880.
	9 June, 1881 ..	24 September, 1881.
Eighth (dissolved 27th June, 1884)	18 May, 1882 ..	15 September, 1882.
	14 June, 1883 ..	8 September, 1883.
	5 June, 1884 ..	24 June, 1884.

PARLIAMENTS—*continued.*

Parliament.	Date of Opening of Sessions.	Date of Prorogation.
Ninth (dissolved 15th July, 1887) ..	7 August, 1884 ..	10 November, 1884.
	11 June, 1885 ..	22 September, 1885.
	13 May, 1886 ..	18 August, 1886.
	26 April, 1887 ..	10 July, 1887.
Tenth (dissolved 3rd October, 1890)	6 October, 1887 ..	23 December, 1887.
	10 May, 1888 ..	31 August, 1888.
	20 June, 1889 ..	19 September, 1889.
	19 June, 1890 ..	18 September, 1890.
Eleventh (dissolved 8th November, 1893)	23 January, 1891 ..	31 January, 1891.
	11 June, 1891 ..	25 September, 1891.
	23 June, 1892 ..	12 October, 1892.
	22 June, 1893 ..	7 October, 1893.
Twelfth (dissolved 14th November, 1896)	21 June, 1894 ..	24 October, 1894.
	20 June, 1895 ..	2 November, 1895.
	11 June, 1896 ..	19 October, 1896.
Thirteenth (dissolved 15th November, 1899)	7 April, 1897 ..	12 April, 1897.
	23 September, 1897	22 December, 1897.
	24 June, 1898 ..	5 November, 1898.
	23 June, 1899 ..	24 October, 1899.
Fourteenth (dissolved 12th November, 1902)	22 June, 1900 ..	22 October, 1900.
	1 July, 1901 ..	8 November, 1901.
	1 July, 1902 ..	4 October, 1902.
Fifteenth	29 June, 1903 ..	25 November, 1903.

SUCCESSIVE MINISTRIES

SINCE THE ESTABLISHMENT OF RESPONSIBLE GOVERNMENT IN NEW ZEALAND IN 1856.

Name of Ministry.	Assumed Office.	Retired.
1. Bell-Sewell	7 May, 1856 ..	20 May, 1856.
2. Fox	20 May, 1856 ..	2 June, 1856.
3. Stafford	2 June, 1856 ..	12 July, 1861.
4. Fox	12 July, 1861 ..	6 August, 1862.
5. Domett	6 August, 1862 ..	30 October, 1863.
6. Whitaker-Fox	30 October, 1863 ..	24 November, 1864.
7. Weld	24 November, 1864	16 October, 1865.
8. Stafford	16 October, 1865 ..	28 June, 1869.
9. Fox	28 June, 1869 ..	10 September, 1872.
10. Stafford	10 September, 1872	11 October, 1872.
11. Waterhouse	11 October, 1872 ..	3 March, 1873.
12. Fox	3 March, 1873 ..	8 April, 1873.
13. Vogel	8 April, 1873 ..	6 July, 1875.
14. Pollen	6 July, 1875 ..	15 February, 1876.

SUCCESSIVE MINISTRIES—*continued.*

Name of Ministry.	Assumed Office.	Retired.
15. Vogel	15 February, 1876	1 September, 1876.
16. Atkinson	1 September, 1876	13 September, 1876.
17. Atkinson (reconstituted) ..	13 September, 1876	13 October, 1877.
18. Grey	15 October, 1877 ..	8 October, 1879.
19. Hall	8 October, 1879 ..	21 April, 1882.
20. Whitaker	21 April, 1882 ..	25 September, 1883.
21. Atkinson	25 September, 1883	16 August, 1884.
22. Stout-Vogel	16 August, 1884 ..	28 August, 1884.
23. Atkinson	28 August, 1884 ..	3 September, 1884.
24. Stout-Vogel	3 September, 1884	8 October, 1887.
25. Atkinson	8 October, 1887 ..	24 January, 1891.
26. Ballance	24 January, 1891 ..	1 May, 1893.*
27. Seddon	1 May, 1893.	

* Owing to the death of the Premier, the Hon. J. Ballance, on 27th April, 1893.

PREMIERS OF SUCCESSIVE MINISTRIES.

Name of Premier.	Name of Premier.
Henry Sewell.	Sir Julius Vogel, K.C.M.G.
William Fox.	Harry Albert Atkinson.
Edward William Stafford.	Harry Albert Atkinson (Ministry reconstituted).
William Fox.	Sir George Grey, K.C.B.
Alfred Domett.	Hon. John Hall.
Frederick Whitaker.	Frederick Whitaker, M.L.C.
Frederick Aloysius Weld.	Harry Albert Atkinson.
Edward William Stafford.	Robert Stout.
William Fox.	Harry Albert Atkinson.
Hon. Edward William Stafford.	Sir Robert Stout, K.C.M.G.
George Marsden Waterhouse.	Sir Harry Albert Atkinson, K.C.M.G.
Hon. William Fox.	John Ballance.
Hon. Julius Vogel, C.M.G.	Rt. Hon. Richard John Seddon, P.C.
Hon. Daniel Pollen, M.L.C.	

SPEAKERS OF THE LEGISLATIVE COUNCIL,
WITH DATES OF THEIR APPOINTMENT AND DATES OF RETIREMENT OR DEATH.

Name of Speaker.	Date of Appointment.	Date of Retirement or Death.
Hon. William Swainson	16 May, 1854 ..	8 August, 1855.
Hon. Frederick Whitaker	8 August, 1855 ..	12 May, 1856.
Hon. Thomas Houghton Bartley ..	12 May, 1856 ..	1 July, 1868.
Hon. Sir John Larkins Cheese Richardson, Kt.	1 July, 1868 ..	14 June, 1879.
Hon. Sir William Fitzherbert, K.C.M.G.	14 June, 1879 ..	23 January, 1891.
Hon. Sir Harry Albert Atkinson, K.C.M.G.	23 January, 1891	28 June, 1892.
Hon. Sir Henry John Miller	8 July, 1892.	
	6 October, 1897	9 July 1903.
Hon. W. C. Walker, C.M.G.	9 July, 1903 ..	5 January, 1904.

SPEAKERS OF THE HOUSE OF REPRESENTATIVES, WITH DATES OF THEIR ELECTION AND DATES OF RETIREMENT.

Name of Speaker.	Date of Election.	Date of Retirement.
Sir Charles Clifford, Bart.	26 May, 1854	
	15 April, 1856 ..	3 June, 1861.
Sir David Monro, Kt. Bach. ..	3 June, 1861	
	30 June, 1866 ..	13 Sept., 1870.
Sir Francis Dillon Bell, K.C.M.G., C.B.	14 August, 1871 ..	21 October, 1875.
Sir William Fitzherbert, K.C.M.G. ..	15 June, 1876 ..	13 June, 1879.
Sir George Maurice O'Rorke, Kt. Bach.	11 July, 1879	
	24 September, 1879	
	18 May, 1882	
	7 August, 1884	
	6 October, 1887	3 October, 1890.
Hon. Major William Jukes Steward ..	23 January, 1891	8 November, 1893.
Hon. Sir George Maurice O'Rorke, Kt. Bach.	21 June, 1894	
	6 April, 1897.	
	22 June, 1900 ..	12 November, 1902.
Arthur Robert Guinness	29 June, 1903.	

FOREIGN CONSULS.

CONSULS OF FOREIGN COUNTRIES RESIDING IN, OR WITH JURISDICTION OVER, NEW ZEALAND, 7TH MAY, 1904.

Country represented.	Office held.	Name.	Place of Residence.
Austria-Hungary	Consul-General for the Commonwealth of Australia, and New Zealand	Otto, Baron Hoenning-O'Carroll	Sydney.
"	Consul ..	E. Langguth	Auckland.
Belgium ..	Consul-General for Australasia and Fiji	F. Huylebroeck	Melbourne.
" ..	Consul ..	Hon. Charles John Johnston	Wellington.
" ..	" ..	Joseph James Kinsey ..	Christchurch.
" ..	" ..	John Burns	Auckland.
" ..	" ..	George Lyon Denniston ..	Dunedin.
Brazil ..	Vice-Consul ..	A. H. Miles	Wellington.
Chili	Consul ..	William Brown	Sydney.
Denmark ..	Consul (for North Island)	Francis Henry Dillon Bell ..	Wellington.
" ..	Consul (for South Island)	Emil Christian Skog ..	Christchurch.
" ..	Vice-Consul ..	Frederick Ehrenfried Baume	Auckland.
" ..	" ..	William Edward Perry ..	Hokitika.
" ..	" ..	O. H. Moller	Dunedin.
France ..	Consul (for New Zealand)	Count Louis Antoine Marie Joseph Henri De Courte	Auckland.
" ..	Consular Agent	Percival Clay Neill ..	Dunedin.

FOREIGN CONSULS—*continued.*

Country represented.	Office held.	Name.	Place of Residence.
France ..	Consular Agent	George Humphreys ..	Christchurch.
" ..	" ..	A. Stuart-Menteath ..	Wellington.
German Empire	Consul-General for Commonwealth of Australia, New Zealand, and Fiji	Paul Von Buri	Sydney.
"	Consul ..	Carl Seegner	Auckland.
"	" ..	Bendix Hallenstein ..	Dunedin.
"	" ..	Philip Kippenberger ..	Christchurch
"	" ..	Friedrich August Krull ..	Wanganui.
"	Vice-Consul ..	Eberhard Focke	Wellington.
Italy	Consul-General for Commonwealth of Australia, New Zealand, and Fiji	C. Bertola	Melbourne.
"	Consular Agent	Thomas Wallace	Christchurch.
"	"	George Fisher	Wellington.
"	"	(Vacant)	Dunedin.
"	"	Geraldo Giuseppe Perotti ..	Greymouth.
"	"	Richard A. Carr	Auckland.
Japan ..	Consul ..	A. S. Aldrich	Wellington.
Liberia ..	" ..	A. M. Meyers	Auckland.
Netherlands ..	Consul-General for Commonwealth of Australia, New Zealand, and Fiji	W. L. Bosschart	Melbourne.
" ..	Consul ..	Hon. Charles John Johnston	Wellington.
" ..	Vice-Consul ..	(Vacant)	Dunedin.
" ..	" ..	Ambrose Millar	Auckland.
" ..	" ..	Harold Featherston Johnston	Wellington.
" ..	" ..	G. de Vries	Christchurch.
Portugal ..	Consul ..	John Duncan	Wellington.
" ..	Vice-Consul ..	Henry Rees George ..	Auckland.
" ..	" ..	Arthur Donald Stuart Duncan	Wellington.
" ..	" ..	Charles William Rattray ..	Dunedin.
Russia ..	Consul-General	Michel Oustinow	Melbourne.
Spain	Honorary Consul (with jurisdiction over Australia and New Zealand)	Henry Cave	Melbourne.
"	Vice-Consul ..	(Vacant)	Christchurch
"	Honorary Vice-Consul	Alexander H. Turnbull ..	Wellington.
Sweden and Norway	Consul ..	Arthur Edward Pearce ..	Wellington.
"	Vice-Consul ..	Sidney Jacob Nathan ..	Auckland.
"	Vice-Consul ..	Walter Joseph Moore ..	Christchurch.

FOREIGN CONSULS—*continued.*

Country represented.	Office held.	Name.	Place of Residence.
United States ..	Consul-General (for New Zealand, Fiji, Society, and other South Sea Islands)	Hon. Frank Dillingham ..	Auckland.
" ..	Vice-Consul-General	Leonard A. Bachelder ..	Auckland.
" ..	Consular Agent	Frank Graham	Christchurch.
" ..	"	William Reid	Wellington.
" ..	"	Frederick Orlando Bridgman	Dunedin.

AGENT-GENERAL FOR NEW ZEALAND IN LONDON.

The Hon. W. P. Reeves, Westminster Chambers, 13, Victoria Street, S.W. Secretary—Walter Kennaway, C.M.G.

THE COLONIAL OFFICE.

APRIL, 1904.

(DOWNING STREET, S.W., LONDON), WITH DATES OF APPOINTMENT.

Principal Secretary of State for the Colonies—Right Hon. Alfred Lyttelton, M.P., 9th October, 1903.

Under-Secretaries: Parliamentary—The Right Hon. the Duke of Marlborough, K.G., November, 1903. Permanent—Sir Montagu Frederick Ommaney, K.C.B., K.C.M.G., June, 1900.

Assistant Under-Secretaries: Frederick Graham C.B.; Charles P. Lucas, C.B.; H. B. Cox (Legal); and Reginald L. Antrobus, C.B.

CROWN AGENTS FOR THE COLONIES.

DOWNING STREET, S.W. CITY OFFICE: 1, TOKENHOUSE BUILDINGS, E.C., LONDON.

Crown Agents—Sir Ernest Edward Blake, K.C.M.G., Major Maurice Alexander Cameron, C.M.G., R.E., and William Hepworth Mercer, C.M.G.

HONOURS HELD BY COLONISTS.

PRIVY COUNCIL.

Seddon, Right Hon. Richard John, 1897.

KNIGHTS COMMANDERS OF THE MOST DISTINGUISHED ORDER OF ST. MICHAEL AND ST. GEORGE (K.C.M.G.).

Buller, Sir Walter Lawry, 1886.
Cadman, Hon. Sir Alfred Jerome, 1903.
Hall, Hon. Sir John, 1882.
Hector, Sir James, 1887.
Perceval, Sir Westby Brook, 1894.
Stout, Hon. Sir Robert, 1886.
Ward, Hon. Sir Joseph George, 1901.

Knights Bachelor (Kt. Bach.).

Campbell, Sir John Logan, 1902.
Miller, Hon. Sir Henry John, 1901.
O'Rorke, Hon. Sir George Maurice, 1880.
Prendergast, Hon. Sir James, 1881.
Russell, Sir William Russell, 1902.
Steward, Hon. Sir William Jukes, 1902.

Companions of the Most Honourable Order of the Bath (C.B.).

Cradock, Major Montagu, 1901.
Davies, Brevet-Colonel R. H., 1901.
Newall, Brevet-Colonel Stewart, 1901.
Porter, Colonel T. W., 1902.
Robin, Brevet-Colonel Alfred William, 1901.

Companions of the Most Distinguished Order of St. Michael and St. George (C.M.G.).

Bauchop Major A., 1902.
Gudgeon, Lieut.-Colonel Walter Edward, 1890.
Jowsey, Lieut.-Colonel Thomas, 1900.
Kennaway, Walter, 1891.
Richardson, Hon. Edward, 1879.
Roberts, John, 1891.

Companions, Distinguished Service Order (D.S.O.).

Abbott, Major F. W., 1902.
Bartlett, Major E., 1902.
Hickey, Lieutenant D. A., 1902.
Hughes, Captain J. G., 1900.
Major. Major C. T., 1900.
Polson, Major D., 1900.
Stevenson, Captain, R., 1902.
Todd, Captain D. J. M., 1900.
Townley, Lieutenant W. V., 1902.
Tudor, Lieutenant P. L., 1902.
Walker, Captain G. H., 1901.

Royal Red Cross.

Williamson, Miss J. M. N., 1900.

Victoria Cross.

Hardham, Farrier-Major W. J., 1901.

New Zealand Cross.

Adamson, Thomas, 1869.
Biddle, Benjamin, 1869.
Black, Solomon, 1869.
Hill, George, 1869.
Lingard, William, 1869.
Mace, Francis Joseph, 1869.
Maling, Christopher, 1869.
Mair, Gilbert, 1870.
Preece, George, 1869.
Roberts, John Mackintosh, 1869.
Rodriguez, Antonio, 1869.
Shepherd, Richard, 1869.
Wrigg, Harry Charles William, 1898.

Distinguished Conduct Medals awarded to Members of New Zealand Contingents in South Africa (1899–1902).

Baigent, Private Ivanhoe.
Black, Sergeant-Major G. C.
Burr, Sergeant-Major W. T.
Cassidy, Sergeant W.
Fletcher, Sergeant-Major W. H.
Free, Private A.
Kent, Sergeant W.
Langham, Sergeant-Major J.
Lockett, Sergeant-Major E. B.
Pickett, Sergeant-Major M.
Rouse, Farrier-Sergeant G.
Travers, Quartermaster-Sergeant.
Wade, Private H. B.
White, Sergeant-Major H.

Persons allowed to retain the Title of "Honourable" within Her Majesty's Dominions.

By despatch from the Secretary of State for the Colonies, dated Downing Street, 15th June, 1893, His Excellency the Governor was apprised that the title of "Honourable," appertaining to Members of the Executive and Legislative Councils in colonies possessing Responsible Government, whether confined to

duration of office or continued for life, was approved by Her late Majesty for use and recognition throughout her dominions, either during office or for life, as the case may be.

By further despatch of 10th March, 1894, the Secretary of State announced that he was prepared in future to submit for the approval of the Sovereign the recommendation of the Governor of any colony having Responsible Government that the President of the Legislative Council or the Speaker of the Legislative Assembly may, on quitting office after three years' service in their respective offices, be permitted to retain the title of "Honourable." This title is now held by Sir G. M. O'Rorke and Major Sir William Jukes Steward.

Besides the Members of the Executive and Legislative Councils, the following ex-Ministers are allowed, as such, to retain the title of "Honourable": Bryce, John, 1884; Cadman, A. J., 1901; Fergus, Thomas, 1891; Hislop, Thomas W., 1891; Johnston, Walter W., 1884; Mitchelson, Edwin, 1891, Oliver, Richard, 1884; Reeves, William P., 1896; Richardson, George F., 1891; Thompson, Thomas, 1900; Tole, Joseph A., 1888; Ward, Sir J. G., 1897.

Retired Judges of Supreme Court.

By despatch of 29th August, 1877, it was announced that retired Judges of the Supreme Court may be allowed the privilege of bearing the title of "Honourable" for life, within the colony. This title is now held by Sir James Prendergast.

GOVERNOR OF NEW ZEALAND.

1st May, 1904.

Ranfurly, His Excellency The Right Honourable Sir Uchter John Mark, fifth Earl of (Ireland, 1831), Viscount Northland, (1791), Baron Welles (1781), Lord-in-Waiting to Her late Majesty (1895–97), Knight Grand Cross of the Most Distinguished Order of Saint Michael and Saint George; Knight of Justice of the Order of St. John of Jerusalem; son of third earl, brother of fourth earl; born 14th August, 1856; succeeded, 1875; married, 1880, the Honourable Constance Elizabeth, only child of seventh Viscount Charlemont, C.B. Living issue: One son (Viscount Northland), two daughters (Ladies Constance and Eileen Knox). Appointed 6th April, 1897, and assumed office 10th August, 1897, as Governor and Commander-in-Chief in and over His Majesty's Colony of New Zealand and its Dependencies. Salary, £5,000. Allowance on account of establishment £1,500, and travelling-expenses £500 per annum. The allowance is not payable for any period during which the Governor is absent from the colony. Residences: Northland House, Dungannon, Ireland; Government House, Wellington; Government House, Auckland.

Private Secretary: Dudley Alexander (Major "The Prince of Wales's Own," West Yorkshire Regiment).

Assistant Private Secretary: The Honourable Charles Edward Hill-Trevor.

Aide-de-Camp: Lieut. Viscount Northland (Coldstream Guards).

Administrator of the Government. — The Chief Justice, appointed under a dormant Commission.

EXECUTIVE COUNCIL.

1st May, 1904.

The annual appropriation for Ministers' salaries is fixed by statute at the sum of £8,900, of which £1,600 is for the Prime Minister, £1,300 for the Minister for Railways, and £1,000 for each of six other Ministers. All Ministers to whom salaries are appropriated are members of the Executive Council, holding one or more of the offices specified by law. Members of the Executive Council travelling within the colony on public service are entitled to allowance not exceeding £1 10s. per day when so engaged, but not during the time a Minister is attending a session of the General Assembly. The members of the Executive Council to whom salaries are payable, and who are not otherwise provided with residences at the seat of Government, are entitled to an allowance in lieu thereof at the rate of £200 a year.

The Executive Council now consists of:—

His Excellency the Governor presiding.

Rt. Hon. Richard John Seddon, P.C., Prime Minister, Colonial Treasurer, Minister of Defence, Minister of Labour, Minister of Education, and Minister of Immigration.

Hon. Sir Joseph George Ward, K.C.M.G., Minister for Railways, Colonial Secretary, Postmaster-General and Commissioner of Electric Telegraphs, Minister of Industries and Commerce, and Minister of Public Health.

Hon. James Carroll, Native Minister and Commissioner of Stamp Duties.

Hon. William Hall-Jones, Minister for Public Works and Minister of Marine.

Hon. James McGowan, Minister of Justice and Minister of Mines. (23rd January, 1900.)

Hon. Thomas Young Duncan, Minister of Lands and Minister for Agriculture. (2nd July, 1900.)

Hon. Charles Houghton Mills, Commissioner of Trade and Customs. (29th October, 1900.)

Hon. Albert Pitt, Attorney-General. (22nd June, 1903.)

Without Portfolio, Hon. Mahuta Tawhiao Potatau te Wherowhero (22nd May, 1903.)

Clerk of the Executive Council—Alexander James Willis.

THE GENERAL ASSEMBLY.

Legislative Council.

The number of members at present constituting the Legislative Council is forty-four. The number cannot be less than ten, but is otherwise unlimited. Prior to 1891 Councillors summoned by the Governor held their appointments for life; but on the 17th of September of that year an Act was passed giving the Council power to elect its own Speaker for a period of five years, and making future ap-

pointments to the Council tenable for seven years only, to be reckoned from the date of the writ of summons of the Councillor's appointment, though every such Councillor may be reappointed. The qualifications are that the person to be appointed be of the full age of twenty-one years, and a subject of His Majesty, either natural-born or naturalised by or under any Act of the Imperial Parliament or by or under any Act of the General Assembly of New Zealand. All contractors to the public service to an amount of over £50 and Civil servants of the colony are ineligible as Councillors. Payment of Councillors is at the rate of £200 a year, payable monthly. Actual travelling-expenses to and from Wellington are also allowed. A deduction of £1 5s. per sitting day is made in case of an absence, except through illness or other unavoidable cause. Under "The Legislative Council Act, 1891," a seat is vacated by any member of the Council: (1.) If he takes any oath or makes any declaration or acknowledgment of allegiance, obedience, or adherence to any foreign Prince or Power; or (2), if he does, or concurs in, or adopts any act whereby he may become a subject or citizen of any foreign State or Power, or is entitled to the rights, privileges, or immunities of a subject of any foreign State or Power; or (3), if he is a bankrupt, or compounds with his creditors under any Act for the time being in force; or (4), if he is a public defaulter, or is attainted of treason, or is convicted of felony or any infamous crime; or (5) if he resigns his seat by writing under his hand addressed to and accepted by the Governor; or (6), if for more than one whole session of the General Assembly he fails, without permission of the Governor notified to the Council, to give his attendance in the Council. By the Standing Orders of the Council, the presence of one-fourth of the members of the Council, exclusive of those who have leave of absence, is necessary to constitute a meeting for the exercise of its powers. This rule, however, may be altered from time to time by the Council.

The ordinary sitting-days are Tuesdays, Wednesdays, Thursdays, and Fridays, from 2.30 p.m. to 5 p.m., resuming again at 7.30 p.m. when necessary.

Roll of Members of the Honourable the Legislative Council of New Zealand, (1st May, 1904.)

Speaker—

Chairman of Committees—The Hon. John Rigg.

Name.	Provincial District.	Date of Appointment.
Arkwright, the Hon. Francis	Wellington.	13 December, 1902.
Baillie, the Hon. William Douglas Hall ..	Marlborough.	8 March, 1861.*
Baldey, the Hon. Alfred	Otago.	18 March, 1903.
Beehan, the Hon. William	Auckland.	22 June, 1903.

*Life members.

ROLL OF MEMBERS OF THE LEGISLATIVE COUNCIL—*continued.*

Name.	Provincial District.	Date of Appointment.
Bolt, the Hon. William Mouat	Otago.	16 October, 1899.
Bowen, the Hon. Charles Christopher ..	Canterbury.	23 January, 1891.*
Cadman, the Hon. Sir Alfred Jerome, K.C.M.G.	Auckland.	21 December, 1899.
Carncross, the Hon. Walter Charles Frederick	Taranaki.	18 March, 1903.
Feldwick, the Hon. Henry	Otago.	16 October, 1899.
Fraser, the Hon. Francis Humphris ..	Wellington.	22 June, 1899.
George, the Hon. Seymour Thorne ..	Auckland.	22 June, 1903.
Gourley, the Hon. Hugh	Otago.	22 June, 1899.
Harris, the Hon. Benjamin	Auckland.	3 February, 1904.
Holmes, the Hon. James	Westland.	18 April, 1902.
Jenkinson, the Hon. John Edward ..	Canterbury.	6 June, 1900.
Johnston, the Hon. Charles John ..	Wellington.	23 January, 1891.*
Jones, the Hon. George	Otago.	13 December, 1902.
Kelly, the Hon. Thomas	Taranaki.	16 October, 1899.
Kelly, the Hon. William	Auckland.	3 February, 1904.
Kenny, the Hon. Courtney William Aylmer Thomas	Marlborough.	15 May, 1885.*
Louisson, the Hon. Charles	Canterbury.	22 December, 1900.
Macdonald, the Hon. Thomas Kennedy ..	Wellington.	22 June, 1903.
McLean, the Hon. George	Otago.	19 December, 1881.*
Marshall, the Hon. James	Westland.	18 April, 1902.
Miller, the Hon. Sir Henry John, Kt. ..	Otago.	8 July, 1865.*
Montgomery, the Hon. William.. ..	Canterbury.	16 October, 1899.
Ormond, the Hon. John Davies ..	Hawke's Bay.	20 January, 1891.*
Peacock, the Hon. John Thomas ..	Canterbury.	9 October, 1877.*
Pinkerton, the Hon. David	Otago.	3 February, 1904.
Pitt, the Hon. Albert, Lieut.-Colonel ..	Nelson.	23 December, 1899.
Reeves, the Hon. Richard Harman Jeffares	Nelson.	13 December, 1902.
Rigg, the Hon. John	Wellington.	6 June, 1900.
Scotland, the Hon. Henry	Taranaki.	24 February, 1868.*
Smith, the Hon. Alfred Lee	Otago.	18 June, 1898.
Smith, the Hon. William Cowper ..	Hawke's Bay.	13 December. 1902.
Stevens, the Hon. Edward Cephas John..	Canterbury.	7 March, 1882.*
Taiaroa, the Hon. Hori Kerei	Otago.	15 May, 1885.*
Thompson, the Hon. Thomas	Auckland.	18 March, 1903.
Trask, the Hon. Francis	Nelson.	18 March, 1903.
Twomey, the Hon. Jeremiah Matthew ..	Canterbury.	18 June, 1898.
Walker, the Hon. Lancelot	Canterbury.	15 May, 1885.*
Wherowhero, the Hon. Mahuta Tawhiao Potatau te	Auckland.	22 May, 1903.
Wigram, the Hon. Henry Francis ..	Canterbury.	22 June, 1903.
Williams, the Hon. Henry	Auckland.	7 March, 1882.*

* Life Members.

Clerk of Parliaments, Clerk of the Legislative Council, and Examiner of Standing Orders upon Private Bills—Leonard Stowe.

Clerk-Assistant—Arthur Thomas Bothamley.

Second Clerk-Assistant—George Moore.

Interpreter—Henry S. Hadfield.

House of Representatives.

The number of members constituting the House of Representatives is eighty—seventy-six Europeans and four Maoris. This number was fixed by the Act of 1900, which came for the first time into practical operation at the general election of 1902. Previously (from 1890) the House consisted of seventy-four members, seventy Europeans and four Maoris; and previously to that (from 1881) of ninety-five members, ninety-one Europeans and four Maoris. The North Island at present returns thirty-eight European members, and the Middle Island thirty-eight. The Cities of Auckland, Wellington, Christchurch, and Dunedin return each three members,* and all other electoral districts one each. The elections are triennial, except in the case of a dissolution by the Governor. Every registered elector, being of the male sex, and free from any of the disqualifications mentioned in 'The Electoral Act, 1902," is eligible for membership. All contractors to the public service of New Zealand to whom any public money above the sum of £50 is payable, directly or indirectly, in any one financial year, as well as the Civil servants of the colony, are incapable of being elected as, or of sitting or voting as, members. The payment made to members of the House of Representatives is £25 per month, amounting to £300 per annum, subject to certain deductions for absence during session not due to sickness or other unavoidable cause. Travelling-expenses to and from Wellington are also allowed. This scale of payment came into force on the 7th November, 1901, under the provisions of "The Payment of Members Act, 1901." Twenty members, inclusive of the Speaker, constitute a quorum. Unless otherwise ordered, the sitting-days of the House are Tuesdays, Wednesdays, Thursdays, and Fridays, from 2.30 p.m. to 5.30 p.m., resuming at 7.30 p.m. Order of admission to the Speaker's Gallery is by ticket obtained from the Speaker. The Strangers' Gallery is open free to the public.

Roll of Members of the House of Representatives.

(1st May, 1904.)

Speaker—Arthur Robert Guinness.

Chairman of Committees—John Andrew Millar.

Name.	Electoral District.	Date of Notification of Return of Writ.
For European Electorates.		
Aitken, John Guthrie Wood ..	City of Wellington ..	10 December, 1902.
Alison, Ewen William	Waitemata ..	"
Allen, Edmund Giblett	Chalmers	"
Allen, James	Bruce	"
Arnold, James Frederick ..	City of Dunedin ..	"
Barber, William Henry Peter ..	Newtown ..	"
Baume, Frederick Ehrenfried ..	City of Auckland ..	"
Bedford, Harry Dodgshun ..	City of Dunedin ..	"

* See note on page 17, *ante*.

Roll of Members of the House of Representatives—*continued.*

Name.	Electoral District.	Date of Notification of Return of Writ.
For European Electorates—contd.		
Bennet, James	Tuapeka	10 December, 1902.
Bollard, John	Eden	"
Buchanan, Walter Clark ..	Wairarapa ..	"
Buddo, David	Kaiapoi	"
Carroll, Hon. James	Waiapu	"
Colvin, James	Buller	"
Davey, Thomas Henry	City of Christchurch	"
Duncan, Hon. Thomas Young ..	Oamaru	"
Duthie, John	City of Wellington..	"
Ell, Henry George	City of Christchurch	"
Field, William Hughes	Otaki	"
Fisher, George	City of Wellington..	"
Flatman, Frederick Robert ..	Geraldine ..	"
Fowlds, George	Grey Lynn ..	"
Fraser, Alfred Levavasour Durell..	Napier	"
Fraser, William	Wakatipu ..	"
Graham, John	City of Nelson ..	"
Guinness, Arthur Robert (Speaker)	Grey	"
Hall, Charles	Waipawa.. ..	"
Hall-Jones, Hon. William ..	Timaru	"
Hanan, Josiah Alfred	Invercargill ..	"
Harding, Alfred Ernest	Kaipara	"
Hardy, Charles Albert Creery ..	Selwyn	"
Herdman, Alexander Laurence ..	Mount Ida ..	"
Herries, William Herbert ..	Bay of Plenty ..	"
Hogg, Alexander Wilson ..	Masterton ..	"
Houston, Robert Morrow ..	Bay of Islands ..	"
Jennings, William Thomas ..	Egmont	"
Kidd, Alfred	City of Auckland ..	"
Kirkbride, Matthew Middlewood ..	Manukau ..	"
Lang, Frederic William	Waikato	"
Laurenson, George	Lyttelton.. ..	"
Lawry, Frank	Parnell	"
Lethbridge, Frank Yates ..	Oroua	"
Lewis, Charles	Courtenay ..	"
McGowan, Hon. James	Thames	"
McKenzie, Roderick	Motueka	"
Mackenzie, Thomas	Waikouaiti ..	"
McLachlan, John	Ashburton ..	"
McNab, Robert	Mataura	"
Major, Charles Edwin	Hawera	"
Mander, Francis	Marsden	"
Massey, William Ferguson ..	Franklin	"
Millar, John Andrew	City of Dunedin ..	"
Mills, Hon. Charles Houghton ..	Wairau	"
Moss, Edward George Britton ..	Ohinemuri ..	"
O'Meara, John	Pahiatua.. ..	"
Reid, Donald (jun.)	Taieri	"
Remington, Arthur Edward ..	Rangitikei ..	"
Rhodes, Robert Heaton	Ellesmere ..	"
Russell, Sir William Russell, Kt. Bach.	Hawke's Bay ..	"
Rutherford, Andrew William ..	Hurunui	"

Name.	Electoral District.	Date of Notification of Return of Writ.
For European Electorates—contd.		
Seddon, Rt. Hon. Richard John, P.C.	Westland ..	10 December, 1902.
Sidey, Thomas Kay	Caversham ..	"
Smith, Edward Metcalf	Taranaki	"
Steward, Hon. Sir William Jukes, Kt. Bach.	Waitaki	"
Symes, Walter	Patea	"
Tanner, William Wilcox.. ..	Avon	"
Taylor, Thomas Edward	City of Christchurch	"
Thomson, James William ..	Clutha	"
Thomson, John Charles	Wallace	"
Vile, Job	Manawatu ..	"
Ward, Hon. Sir Joseph George, K.C.M.G.	Awarua	"
Wilford, Thomas Mason	Hutt	"
Willis, Archibald Dudingston ..	Wanganui ..	"
Witheford, Joseph Howard ..	City of Auckland ..	"
Witty, George	Riccarton ..	"
Wood, William Thomas	Palmerston ..	"
For Maori Electorates.		*Day of Election.*
Heke, Hone	Northern Maori ..	22 December, 1902.
Kaihau, Henare	Western Maori ..	"
Parata, Tame	Southern Maori ..	"
Pere, Wiremu	Eastern Maori ..	"

Clerk of House of Representatives—H. Otterson.
Clerk-Assistant—A. J. Rutherfurd.
Second Clerk-Assistant—A. F. Lowe.
Sergeant-at-Arms—Major T. V. Shepherd.
Reader and Clerk of Bills and Papers—E. W. Kane.
Chief *Hansard* Reporter—Silas Spragg.
Interpreters—L. M. Grace, D. F. G. Barclay.
Clerk of Writs—H. Pollen.
Deputy Clerk of Writs— R. F. Lynch.
Chief Librarian—Charles Wilson.

OFFICIAL LIST.

(1st April, 1904.

PRIME MINISTER'S OFFICE.

Prime Minister—Rt. Hon. R. J. Seddon, P.C.
Secretary to Cabinet—A. J. Willis

COLONIAL SECRETARY'S DEPARTMENT.

Chief Office.

Colonial Secretary—Hon. Sir J. G. Ward, K.C.M.G.
Under-Secretary—Hugh Pollen
Chief Clerk—R. F. Lynch
Clerks—J. F. Andrews, A. R. Kennedy, F. A. de la Mare
Officer in Charge of Government Buildings—W. H. Hennah

Audit Office.

Controller and Auditor-General—J. K. Warburton
Assistant Controller and Auditor—J. C. Gavin
Chief Clerk—L. C. Roskruge
Clerks—W. G. Holdsworth, H. S. Pollen, E. J. A. Stevenson, J. T. Dumbell, C. E. Easton
Cadets—G. G. Smith, J. A. Hay, G. S. Gapper, H. T. Thompson, R. M. Sunley, J. P. Rutherford, T. Treahy, A. A. Cairns
Cadette—E. A. Casey
Extra Clerks—D. C. Innes, A. E. Bybles, C. E. Briggs, E. E. Smythe, J. McC. Hamilton, T. S. Hamer
Chief Audit Inspector and Audit of Local Bodies—P. P. Webb
Clerk—J. Ward
Audit Officer, Agent-General's Office, London—C. F. W. Palliser
Audit Inspectors—A. H. Maclean, J. King, A. W. Eames, G. H. I. Easton, C. P. Johnson, H. A. Lamb, A. A. Bethune, J. H. Fowler, R. A. Gray

Registrar-General's Office.

Registrar-General—E. J. Von Dadelszen
Chief Clerk and Deputy Registrar-General—G. Drury
Clerks—F. H. Machattie, W. W. Cook, Ben Keys
Index Clerk—S. Coffey

Registrars of Births, Deaths, and Marriages.

Four Chief Towns.

Auckland—E. H. Lyons
Wellington—F. W. Mansfield
Christchurch—L. C. Williams
Dunedin—H. Maxwell

Printing and Stationery Department.

Government Printer, Stationery Office Manager, and Controller of Stamp Printing—John Mackay
Superintending Overseer—J. J. Gamble
Chief Clerk and Accountant—B. B. Allen
Clerk and Computer—N. B. K. Manley
Clerks—F. Barraud, J. W. Hall, R. Watts, A. Stace, A. Williams
Cadette—
Cadet—P. C. Jordan
Hansard Supervisor—M. F. Marks
Overseers—B. Wilson, J. F. Rogers
Overseer, Jobbing-room—G. Tattle
Night Foreman—
Readers—W. Fuller, H. S. Mountier, H. Lee, W. Sutherland
Overseer, Machine-room—J. Phillips
Sub-overseer, Machine-room—John Burns
Overseer, Binding Branch—W. Franklin
Sub-overseer, Binding Branch—G. H. Broad
Forewoman, Binding Branch—Miss O'Malley
Stamp Printer—H. Hume
Overseer, Lithographic Branch—D. Ross
Chief Draughtsman—G. N. Sturtevant
Stereotyper and Electrotyper—W. J. Kirk
Engineer—T. R. Barrer

Colonial Museum and Observatories.

Director—A. Hamilton
Cadet—C. Freyberg
Astronomical Observer—T. King
Meteorological Observer, Auckland—T. F. Cheeseman, F.L.S.
Meteorological Observer, Dunedin—H. Skey

Meteorological Observer, New Plymouth —G. W. Palmer
Meteorological Observer, Hokitika—A. D. Macfarlane
Meteorological Observer, Rotorua—Dr. Wohlmann
Meteorological Observer, Te Aroha—W. Hill
Meteorological Observer, Lincoln—Geo. Gray
Meteorological Observer, Hanmer Plains —J. B. Gould

NEW ZEALAND INSTITUTE.

President — Captain F. W. Hutton, F.R.S.
Hon. Treasurer—J. W. Joynt, M.A.
Hon. Secretary—H. Gill

COLONIAL TREASURER'S DEPARTMENT.

CHIEF OFFICE.

Colonial Treasurer—Rt. Hon. R. J. Seddon, P.C.
Secretary to the Treasury, Receiver-General, Paymaster-General, and Registrar of New Zealand Consols—James B. Heywood
Assistant Secretary and Accountant to the Treasury—Robert J. Collins
Cashier—C. E. Chittey
Corresponding Clerk—H. Blundell
Clerks—R. B. Vincent, E. L. Mowbray, A. O. Gibbes, J. Holmes, H. N. W. Church, A. J. Morgan, T. J. Davis, F. H. Tuckey, H. Hawthorn, W. Wilson, G. C. Rodda, E. Fisher
Cadets—W. Gillanders, W. L. Clapson, A. Hore, P. Dunstan
Cadettes—L. McIntosh, M. Ralston, D. M. Schramm, H. M. Batham, E. M. Taylor, E. A. C. Burrage, R. B. Banks
Officer for Payment of Imperial Pensions at Auckland—B. J. Daveney

FRIENDLY SOCIETIES, TRADE UNIONS, FINE ARTS AND DRAMATIC WORKS COPYRIGHT, AND UNCLASSIFIED SOCIETIES REGISTRY OFFICE.

Registrar and Actuary—George Leslie
Revising Barrister—L. G. Reid
Clerk and Deputy Registrar—C. T. Benzoni
Cadette—M. A. Bridson

OLD-AGE PENSIONS DEPARTMENT.

Head Office.

Registrar—J. Eman Smith
Chief Clerk—G. C. Fache
Clerks—F. M. Leckie, J. S. Lambert, R. S. Stokes, F. G. Twiss
Cadets—P. Cunningham, G. N. Morris, T. G. C. Mackay

District Agencies.

Deputy Registrars—
Auckland—S. Ruddock. Cadet—J. H. Boyes
Wellington—F. W. Mansfield
Christchurch—L. C. Williams
Dunedin—Robert Hill. Cadet—T. B. Purves
Invercargill—J. R. Colyer. Cadet—E. B. Patrick
Coromandel—D. Banks
Dargaville—S. Thompson
Hamilton—W. Shanaghan
Helensville—J. Watt
Kaitaia—W. Sefton
Mangonui—J. Henry
Maungaturoto—J. Hemphill
Otahuhu—G. Foreman
Raglan—W. McCarthy
Rawene—F. A. Moore
Rotorua—W. Bern
Russell—W. J. Pardy
Taupo—J. Ryan
Warkworth—S. Stacey
Whangarei—T. Kirk
Whangaroa—A. G. Douthet
Thames—J. Jordan
Opotiki—C. O'Reilly
Paeroa—H. R. Bush
Tauranga—W. A. Thom
Te Aroha—H. R. Bush
Whakatane—P. Stackpoole
Gisborne—G. J. A. Johnstone
Port Awanui—W. Kelly
Napier—R. B. Mathias
Dannevirke—S. Tansley
Waipawa—J. Eccleton
Wairoa—H. H. Carr
New Plymouth—W. A. D. Banks
Stratford—J. B. Stoney
Wanganui—C. A. Barton
Hawera—A. Trimble
Marton—J. E. Patrick
Patea—M. O'Brien
Feilding—J. M. Rodgers
Greytown—H. D. Armour
Masterton—E. Rawson
Otaki—T. O'Rourke
Pahiatua—W. J. Reeve
Palmerston North—W. Matravers

Nelson—C. H. Webb-Bowen
Motueka—L. Read
Blenheim—J. Terry
Havelock—H. McArdle
Akaroa—E. P. Bird
Amberley—M. Roche
Ashburton—T. W. Tayler
Culverden—A. S. Bird
Kaiapoi—A. G. Ashby
Kaikoura—J. P. Clarkson
Timaru—T. Howley
Fairlie—S. Kidd
Temuka—J. Gillespie
Waimate—W. Y. Purchase
Greymouth—B. Harper
Reefton—A. Askenbeck
Hokitika—J. C. Malfroy
Westport—E. C. Kelling
Oamaru—R. P. Ward
Balclutha—W. A. Matthews
Clyde—F. T. D. Jeffrey
Lawrence—A. M. Eyes
Milton—D. McRae
Naseby—F. W. Hart
Palmerston South—W. Hilliard
Port Chalmers—H. R. Paterson
Queenstown—A. A. Mair
Riverton—A. F. Bent
Chatham Islands—R. W. Rayner

LAND AND INCOME TAX DEPARTMENT.

Commissioner—John McGowan
Deputy Commissioner—G. F. C. Campbell
Chief Clerk—F. J. M. D. Walmsley
Accountant—P. Heyes

Land Tax.

Clerk in Charge—H. Nancarrow
Clerks — D. R. Purdie, J. Stevenson, E. W. Watson, E. Randell, J. N. Grant, M. Fraser, J. Ferguson, H. S. Barron, C. E. J. Dowland

Income Tax.

Clerk in Charge—J. M. King
Clerks—W. M. Tyers, J. W. Black, D. G. Clark, G. W. Jänisch, C. T. Rout, H. A. Anderson
Receiver of Land and Income Tax—C. V. Kreeft
Cadets—J. M. Park, N. H. Mackie
Cadettes—G. Cooke, K. L. Morgan

DEPARTMENT OF JUSTICE.

(As on 1st May.)

Head Office.

Minister of Justice — Hon. James McGowan
Under-Secretary—F. Waldegrave
Chief Clerk—C. B. Jordan
Translator—G. H. Davies
Clerks—C. E. Matthews, G. F. Dixon, L. A. B. Teutenberg

Crown Law Office.

Attorney-General—Hon. Albert Pitt
Solicitor-General—F. Fitchett, M.A., LL.D.
Assistant Law Officer—L. G. Reid
Law Draftsman—
Clerk—E. Y. Redward
Cadet—T. Christie

Patent Office.

Registrar of Patents, Designs, and Trade Marks—F. Waldegrave
Deputy Registrar—J. C. Lewis
Clerk—Mary Eyre
Cadet—J. T. Bishop

Judicial.

Supreme Court Judges.

Chief Justice—
Wellington—Sir R. Stout, K.C.M.G.
Judges—
Wellington — Theo. Cooper, F. R. Chapman
Auckland—W. B. Edwards
Christchurch—J. E. Denniston
Dunedin—J. S. Williams

District Court Judges.

Hamilton and Thames—C. C. Kettle
Wairarapa, Wanganui, New Plymouth, Stratford, Hawera, Palmerston North, Pahiatua, Nelson, Ashburton, Timaru, Oamaru, Queenstown, Naseby, Lawrence, Invercargill, Gore, Hokitika, Greymouth, Westport, Reefton, and Kumara—C. D. R. Ward

Registrars of the Supreme Court.

Auckland—H. C. Brewer
New Plymouth—T. Hutchison
Wanganui—R. L. Stanford
Napier—H. W. Brabant
Gisborne—W. A. Barton
Wellington—D. G. A. Cooper
Nelson—H. Eyre-Kenny
Blenheim—T. Scott Smith

Christchurch—A. R. Bloxam
Hokitika—V. G. Day
Dunedin—G. A. King
Invercargill—J. R. Colyer

Sheriffs.

Auckland—H. C. Brewer
Taranaki—W. A. D. Banks
Hawke's Bay—H. W. Brabant
Poverty Bay—W. A. Barton
Wellington—D. G. A. Cooper
Wairarapa—E. Rawson
Wanganui and Rangitikei—C. A. Barton
Nelson—W. Heaps
Westland North—E. C. Kelling
Central Westland—A. Askenbeck
Marlborough—J. Terry
Canterbury—A. R. Bloxam
Timaru—C. A. Wray
Westland—V. G. Day
Otago—G. A. King
Southland—J. R. Colyer

Crown Solicitors.

Auckland—Hon. J. A. Tole
New Plymouth—W. Kerr
Gisborne—J. W. Nolan
Napier—H. A. Cornford
Wellington—F. H. D. Bell
Wanganui—S. T. Fitzherbert
Palmerston North—H. S. Fitzherbert
Nelson—C. Y. Fell
Blenheim—R. McCallum
Christchurch—T. W. Stringer
Timaru—J. W. White
Dunedin—J. F. M. Fraser
Invercargill—T. M. Macdonald
Oamaru—A. G. Creagh

Crown Prosecutors (District Courts).

New Plymouth—W. Kerr
Stratford—W. Kerr
Hawera—E. L. Barton
Wanganui—S. T. Fitzherbert
Palmerston North—H. S. Fitzherbert
Masterton—A. R. Bunny
Nelson—C. Y. Fell
Westport and Reefton—C. E. Harden
Hokitika—J. Park
Greymouth—M. Hannan
Timaru—J. W. White
Oamaru—A. G. Creagh
Queenstown—Wesley Turton
Invercargill—T. M. Macdonald

Stipendiary Magistrates.

Auckland—C. C. Kettle
Pokeno, Waikato, &c.—H. W. Northcroft
Onehunga, &c.—E. C. Blomfield*
Russell, &c.—R. S. Florance
Tauranga, &c.—J. M. Roberts*
Thames, &c.—R. S. Bush*
Gisborne, &c.—W. A. Barton
New Plymouth—T. Hutchison
Hawera, &c.—A. Turnbull
Wanganui, &c.—R. L. Stanford
Palmerston North, &c.—A. D. Thomson
Wellington, &c.—A. McArthur, M.A., LL.D.
Wairarapa, &c.—W. P. James
Napier, &c.—H. W. Brabant
Nelson, &c.—H. Eyre-Kenny*
Blenheim, &c.—T. Scott-Smith
Christchurch, &c.—W. R. Haselden
Kaiapoi, &c.—H. W. Bishop
Timaru, &c.—C. A. Wray
Greymouth, Westport, &c.—W. G. K. Kenrick
Hokitika, &c.—V. G. Day
Dunedin, &c.—E. H. Carew,* C. C. Graham
Oamaru, &c.—J. Keddell*
Milton, &c.—G. Cruickshank*
Clyde, &c.—F. J. Burgess*
Naseby—J. McEnnis*
Invercargill, &c.—S. E. McCarthy*
Chatham Islands—

Official Assignees in Bankruptcy.

Auckland—E. Gerard
Wellington—J. Ashcroft, J.P.
Christchurch—G. L. Greenwood
Dunedin—C. C. Graham, S.M.

Clerks of District and Magistrates' Courts.

New Plymouth—W. A. D. Banks
Hawera—A. Trimble
Wanganui—C. A. Barton
Palmerston North—W. Matravers
Masterton—E. Rawson
Nelson—C. H. Webb-Bowen
Hokitika—J. C. Malfroy
Kumara—T. M. Lawlor
Greymouth—B. Harper
Westport—E. C. Kelling
Reefton—A. Askenbeck
Timaru—T. Howley
Ashburton—T. W. Tayler
Oamaru—R. P. Ward
Invercargill—J. R. Colyer
Queenstown—A. A. Mair
Lawrence—A. M. Eyes
Naseby—F. Hart

* Are also Wardens of Goldfields.

Receivers of Gold Revenue, Mining Registrars, and Clerks of Wardens' and Magistrates' Courts.

Thames—J. Jordan
Coromandel—D. Banks
Paeroa—H. R. Bush
Waihi—E. W. Cave
Tauranga—W. A. Thom
Whangarei—T. Kirk
Havelock (Marlborough)—H. McArdle
Nelson—C. H. Webb-Bowen
Blenheim—John Terry
Motueka—L. Read
Collingwood—J. N. Nalder
Westport—E. C. Kelling
Charleston—E. Brophy
Reefton—A. Askenbeck
Ahaura—W. D. Wallace
Greymouth—B. Harper
Kumara—T. M. Lawlor
Hokitika—J. C. Malfroy
Ashburton—T. W. Tayler
Naseby, &c.—F. Hart
Wyndham—D. Bogue
Clyde, Black's, and Alexandra—F. T. D. Jeffrey
Cromwell—E. D. Mosley
Queenstown and Arrowtown—A. A. Mair
Lawrence—A. M. Eyes
Gore—M. Foley
Riverton—A. F. Bent

Clerks of Magistrates' Courts.

Auckland—H. H. G. Ralfe
Gisborne—G. J. Johnstone
Hamilton—W. Shanaghan
Napier—R. B. Mathias
Hastings—P. Skerrett
Wairoa—H. H. Carr
Stratford—C. J. Hewlett
Dannevirke—S. Tansley
Marton, &c.—J. E. Patrick
Feilding—J. M. Rodgers
Otaki—T. O'Rourke
Wellington—A. H. Holmes
Christchurch—W. Martin
Lyttelton—J. Fitzgerald
Kaiapoi—A. G. Ashby
Waimate—W. Y. Purchas
Dunedin—W. G. P. O'Callaghan
Port Chalmers—R. H. Paterson

NATIVE LAND COURT.

Chief Judge—G. B. Davy
Judges—H. W. Brabant, H. F. Edger, W. G. Mair, H. D. Johnson, J. M. Batham
Registrars—Auckland, J. W. Browne; Gisborne, J. Brooking; Wellington, R. C. Sim

Commissioners of the Native Land Court.

R. S. Bush, A. Turnbull, E. C. Blomfield, C. C. Kettle, J. M. Roberts, W. Stuart, H. W. Bishop, E. H. Carew, H. Eyre-Kenny, R. L. Stanford, T. Hutchison, H. W. Robinson, R. S. Florance: Sub-Commissioners—J. Brooking, W. A. Thom
Government Native Agent, Otorohanga—G. T. Wilkinson

VALIDATION COURT.

Chief Judge—G. B. Davy
Judges—The Judges of the Native Land Court
Registrars—The Registrars of the Native Land Court

CORONERS.

Auckland, T. Gresham, E. Baker; Arrowtown, H. Graham; Coromandel, A. R. H. Swindley; Collingwood, E. Davidson; Feilding, J. J. Bagnall; Hamilton, J. S. Bond; Hawera, C. E. Major; Kawhia, T. D. Hamilton; Marton, J. J. McDonald; Otahuhu, S. Luke; Otaki, W. H. Simcox; Paeroa, W. Forrest; Pahi, J. B. Ariell; Palmerston North, J. Mowlem; Port Albert, L. P. Becroft; Queenstown, L. Hotop; Raglan, W. H. Wallis; Midhirst, J. Mackay; Taihape, J. P. Aldridge; Takaka, A. Sinclair; Tapanui, W. Quin; Thames, A. Bruce; Tauranga, A. C. H. Tovey; Te Awamutu, J. B. Teasdale; Te Kopuru, T. Webb; Waihi, M. D. King; Waipawa, S. Johnson; Wellington, J. Ashcroft; Whangarei, J. M. Killen; Woodville, E. J. Gothard. All Stipendiary Magistrates are *ex officio* Coroners.

NEW ZEALAND POLICE DEPARTMENT.

Head Office.

Commissioner—Walter Dinnie
Chief Clerk—John Evans
Clerks—John Tasker, Walter Gollan

Police Force.

Inspectors—John Cullen, John Wybrant Ellison, Robert James Gillies, Terence O'Brien, Ewen Macdonell, Nicholas Kiely, Edward Wilson, Alfred James Mitchell
Sub-Inspectors—Patrick Black, Henry Green, John Dwyer, John O'Donovan

PRISONS DEPARTMENT.

Inspector—Lieut.-Colonel Arthur Hume, N.Z.M.
Clerk—T. E. Richardson
Gaolers — Auckland, Francis Egerton Severne; Dunedin, John Henry Bratby; Hokitika, Thomas Rosson Pointon, Invercargill, Alexander Armstrong; Lyttelton, Matthew Michael Cleary; Napier, Michael Flannery; New Plymouth, Bartholomew Lloyd O'Brien; Wanganui, Robert T. N. Beasley; Wellington, Patrick Samuel Garvey; Waiotapu, Jeremiah Charles Scanlon; Hanmer Springs, Alexander William Roberts

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DEPARTMENT OF INDUSTRIES AND COMMERCE.

Minister—Hon. Sir J. G. Ward, K.C.M.G.
Secretary—T. E. Donne
Acting Chief Clerk—G. S. Munro

DEPARTMENT OF TOURIST AND HEALTH RESORTS.

Minister—Hon. Sir J. G. Ward, K.C.M.G.
Superintendent—T. E. Donne
Chief Clerk—C. R. C. Robieson
Inspector—F. Moorhouse
Accountant—R. E. Hayes
Journalist—J. Cowan
Clerks—H. Kirk, P. J. Kelleher, J. Andrews, R. G. M. Parr, J. W. Hill, S. J. Collett, G. F. McGirr, C. T. Brebner
Shorthand-writers and Typists—S. Dimant, N. Lambert
District Agents—Auckland, E. H. Montgomery; Te Aroha, W. Hill; Rotorua, C. Walnutt; Christchurch, W. R. Blow; Dunedin, G. W. C. Moon; Invercargill, W. A. Saunders
Government Balneologist, Rotorua—A. S. Wohlmann, M.D., M.R.C.S., L.R.C.P.
House Surgeon, Rotorua—W. B. Craig, M.B.
Resident Medical Officer, Te Aroha—G. G. Kenny, M.B.
Manager, Hanmer Hot Springs—J. B. Gould

DEPARTMENT OF LABOUR.

Minister of Labour—Rt. Hon. R. J. Seddon, P.C.
Wellington—
Secretary for Labour, Chief Inspector of Factories, and Registrar of Industrial Unions—E. Tregear
Chief Clerk, Deputy Chief Inspector of Factories, and Deputy Registrar of Industrial Unions—James Mackay
Clerks—F. Rowley, J. W. Collins, W. H. Hagger, W. J. McKeown, and W. J. Jamieson, C. E. Aldridge
Shorthand Writer and Typiste—R. Ritson
Cadets — W. Linklater, Thomas McIntosh
Officer in Charge Women's Branch—Mrs. Helen Staveley
Auckland—Clerk, E. A. LeCren. Cadet, W. E. Shanahan
Christchurch—Clerk, A. J. R. Isherwood
Dunedin—Clerk, Jean Maxwell

INSPECTORS OF FACTORIES.

North Island — J. Shanaghan, H. Ferguson, E. A. Le Cren, W. J. Blake, W. H. Hagger, Margaret Hawthorne, W. H. McQuarters, H. H. Knowles, and 75 local Inspectors
South Island—J. Shanaghan, J. Lomas, A. J. R. Isherwood, L. D. Browett, S. Tyson, James Isdell, T. O'Grady, R. S. Bean, J. B. Lindsay, P. Hally, P. Keddie, W. H. Hagger, Margaret Hawthorne, and 70 local Inspectors
(There are also 200 Bureau Agents in different parts of the colony.)

PUBLIC WORKS DEPARTMENT.

HEAD OFFICE.

Minister for Public Works—Hon. W. Hall-Jones
Under-Secretary—H. J. H. Blow
Engineer-in-Chief—W. H. Hales
Superintending Engineer—P. S. Hay, M.A., M.Inst.C.E.
Inspecting Engineer—R. W. Holmes, M.Inst.C.E.
Architect—J. Campbell
Chief Clerk—W. D. Dumbell
Accountant—G. J. Clapham
Land-purchase Officer—H. Thompson
Record Clerk—H. W. H. Millais

Clerks—G. C. Schmidt, P. S. Waldie, E. Bold, A. Biddell, A. H. Kimbell, N. Jacobs, C. E. Crawford, W. McNamara, H. F. Curtis, A. Sampson, T. H. Hanna, J. J. Bennett, A. L. Goldfinch, L. White, E. Kidd, K. Webb

Chief Draughtsman—W. G. Rutherford

Draughtsmen—E. Jackson, C. A. Lawrence, W. Withers, L. L. Richards, W. G. C. Swan, J. H. Price, A. E. King, R. G. Applegarth, A. F. Macrae, T. S. Lambert, F. S. Marchant, S. W. May-Somerville, A. T. Ford, G. V. Venning

Head Storekeeper—J. C. Fulton

Engineering Cadets — H. Vickerman, B.Sc., H. Patterson

Clerical Cadet—W. S. King

Clerical Cadettes—E. M. B. Lynch, M.A., W. L. J. Mellsop

District Offices.

District Engineers — Auckland, C. R. Vickerman; Dunedin, E. R. Ussher, M.Inst.C.E.

Resident Engineers—Hunterville, G. L. Cook, M.Inst.C.E.; Taumaranui, J. D. Louch, Assoc.M.Inst.C.E.; Nelson, W. A. Shain; Westport, R. A. Young, Assoc.M.Inst.C.E.; Greymouth, J. Thomson, B.E.; Springfield, J. A. Wilson, Assoc.M.Inst.C.E., J. J. Hay, M.A.

Assistant Engineers—S. J. Harding, J. H. Dobson, F. M. Hewson, J. Hannah, J. H. Lewis, G. C. McGlashan, C. E. Armstrong, F. W. Furkert, W. Widdowson, H. Dickson, J. W. E. McEnnis, A. Ross, J. V. Haskell, C. A. Owen, J. Meenan, A. Stewart, W. P. Moynihan, W. Sherratt, C. J. McKenzie, F. P. Bartley, J. J. Wilson

Engineering Cadets—F. S. Dyson, J. Wood, L. B. Campbell, W. E. Fitzgerald, J. McNair, J. Norris, P. McNab, P. Keller, F. C. Hay, H. H. Sharp, T. M. Crawford, H. T. Thompson, R. Park

Draughtsmen—C. Wood, P. F. M. Burrows, J. Baird, W. H. Hislop, T. J. McCosker, J. J. Fraser, H. C. W. Wrigg, J. B. Robertson, W. J. C. Slane

Clerks—W. Black, C. T. Rushbrook, A. R. Stone, J. H. Denton, A. J. Sutcliffe, E. Waddell, L. P. Cabot, J. B. Borton, P. P. Giesen, F. E. Banks, H. Grave, G. T. Grace, E. G. Beale, J. A. White, C. A. Alabone, E. J. Edwards, C. T. Williams, L. M. Shera, H. M. O'Donnell, S. A. Holland, W. A. Bowie, H. Colvin, W. Sotheran

Storekeepers—T. Douglas, C. Loomes, S. J. Moncrieff

Clerical Cadet—A. D. Park

Clerical Cadette—E. J. Colquhoun

RAILWAYS DEPARTMENT.

Minister for Railways—Hon. Sir J. G. Ward, K.C.M.G.

Head Office.

General Manager—T. Ronayne

Chief Clerk—R. W. McVilly

Clerks—E. J. Andrews, B. M. Wilson, W. S. Ridler, J. L. Day, J. O. Duff, J. Hislop, J. E. Widdop, W. H. Gifford, J. V. Fogo, D. MacKellar, J. Thomson, W. A. Wellings, P. J. McGovern, W. H. Warren, W. P. Miller, H. Gerard, C. T. Reehal, F. C. Fraser, A. J. Levick, W. H. Rennie, R. W. Warren

Audit Inspectors—H. Baxter, D. Munro, R. Hislop, I. Faris

Railway Accountant—H. Davidson

Clerks—J. H. Davies, S. P. Curtis, G. G. Wilson, J. McLean, E. Davy, A. Morris, C. Batten, J. Firth, W. B. Fisher, E. J. Fleming, H. H. Leopard, R. J. Loe, W. Bourke, T. Pattle, A. J. Belworthy, F. W. Lash, A. H. Hunt, H. D. Smith, W. E. Ahern, F. K. Porteous, A. D. C. Gosman, T. A. O'Connor, A. E. Wilson, C. C. Felton, J. W. Dayman, W. H. Simmons, J. B. Gauntlett, A. T. Parkes, C. U. McGrath

Stores Branch.

Stores Manager—G. Felton

Stores Audit Inspector—F. J. Dawes

Clerks—M. C. Rowe, G. H. Norie, S. Alpe, H. W. Barbor, A. E. Boyes, W. G. Wray, R. P. Bray, L. G. Porter, G. H. Stubbs, S. S. Millington, J. Kerr, A. D. Lincoln, J. Brabiner, J. Hayes, J. Ginnane, V. C. Hardie, G. D. Pattle, J. H. Martin

Traffic Branch.

Chief Traffic Manager—H. Buxton

Relieving District Traffic Manager—

Clerks—J. E. Armstrong, G. A. C. Robieson, J. D. Nash

Traffic Superintendents—Wellington, T. Arthur; Dunedin, A. Grant

District Managers—Whangarei, E. E. Gillon; Auckland, T. W. Waite; Wanganui, W. Stringleman; Westland, F. W. Styles; Christchurch, S. F. Whitcombe; Invercargill, C. A. Piper
Stationmasters in Charge—Kawakawa, J. T. Parsons; Kaihu, R. B. Peat; Gisborne, G. G. Wellsted; Westport, T. Hay-Mackenzie; Nelson, E. G. Wilson; Picton, T. S. Edwards

MAINTENANCE BRANCH.

Chief Engineer for Working Railways—J. Coom, M.Inst.C.E.
Inspecting Engineer—J. Burnett, M.Inst. C.E.
Signal Engineer—H.J.Wynne, A.M.Inst. C.E.
Railway Land Officer—E. G. H. Mainwaring
Inspector of Bridge Construction—A. H. Alabaster
Electrician—J. T. Fahy
Electric Mechanician—T. Hendry
Office Engineer—G. A. Troup
Draughtsmen—J. Besant, C. T. Jeffreys, W. R. B. Bagge, Ad. Howitt, L. Reynolds, A. S. Henderson, W. W. Fry, G. G. Wilson, jun.
Clerks—W. P. Hicks, J. T. Ford, W. A. Mirams, H. Jessup, T. H. Wilson, E. S. Kelly, H. W. Rowden, J. M. Robb, F. J. Rowden, E. D. Richards, W. B. O'Brien, G. P. Parrell, T. Trezise, H. McAlister, F. T. A. Williams, H. G. C. Simmons, O. Foreman, C. S. Nelson
District Engineers—Auckland, C. H. Biss; Wanganui, D. T. McIntosh; Wellington, A. C. Koch; Westport and Westland, F. J. Jones; Christchurch, H. Macandrew; Dunedin, F. W. MacLean; Invercargill, A. J. McCredie

LOCOMOTIVE BRANCH.

Chief Mechanical Engineer—A. L. Beattie
Clerks—J. P. Kelly, R. Aekins, D. D. Weir, J. Rumgay, J. Worthington, H. McKeowen, H. B. Sturmer, C. L. Pettit, J. H. Leopard, J. P. McKeowen, E. S. Stringleman, N. E. White, J. Linehan, E. M. Bish, F. C. Reynolds, A. A. B. Boult
Chief Draughtsman—G. A. Pearson
Draughtsmen—R. Pye-Smith, G. Wilson, A. Smellie, J. M. Porteous
Boiler Inspector—J. W. Nichols
Locomotive Engineers—Auckland, A. V. Macdonald; Wellington-Napier-New Plymouth, T. A. Peterkin; Hurunui-Bluff, H. H. Jackson; Westport and Westland, G. E. Richardson. Relieving, F. T. Murison
Brake Engineer—J. H. Fox
Loco. Inspector—E. L. W. Haskins

BOARD OF APPEAL.

North Island.

H. Eyre-Kenny, Stipendiary Magistrate, Chairman, appointed by the Governor
H. Davidson, Railway Accountant's Office, elected
W. T. Wilson, Engineman, elected
M. J. Mack, Guard, elected
W. Morrison, Ganger, elected
(Workshop representative to be elected)

Middle Island.

C. D. R. Ward, District Judge, Chairman, appointed by the Governor
A. Graham, Stationmaster, elected
A. Dunn, Guard, Christchurch, elected
J. A. McCullough, Leading Tinsmith, elected
D. Wilson, Engineman, elected
R. Duncan, Surfaceman, elected

POST AND TELEGRAPH DEPARTMENT.

GENERAL POST OFFICE.

Postmaster-General and Electric Telegraph Commissioner—Hon. Sir J. G. Ward, K.C.M.G.
Secretary—W. Gray
Superintendent of Electric Lines—J. K. Logan
Assistant Secretary and Inspector—T. Rose
Controller of Money-orders and Savings-banks, and Accountant—G. Gray
Chief Clerk—D. Robertson
Assistant Controller Money-Orders and Savings-Banks, and Assistant Accountant—W. R. Morris
Clerks, Secretary's Office—F. V. Waters (Second Clerk), H. Plimmer, J. C. Williamson, W. Crow, V. J. Brogan, T. Ward, H. D. Grocott, J. C. Redmond, A. T. Markmann, W. J. Gow, F. W. Furby, J. B. Jordan, S. Macalister, J. P. P. Clouston, W. J. Wilkie, W. H. Barnett, A. Donovan

Master of cable steamer "Tutanekai"—C. F. Post
Mail Agents—W. Isbister, D. E. Lindsay
Clerks, Inspector's Branch—G. V. Hudson, J. Brennan, W. A. Tanner, F. S. Robins, S. M. Harrison, G. P. Edwards, H. McGill
Clerks, Accountant's Branch—J. L. H. Ledger, H. A. R. Huggins, G. W. Moorhouse, W. Callaghan, W. Chegwidden, R. J. Thompson, H. Cornwall, F. Perrin, J. J. Esson, D. A. Jenkins, H. N. McLeod, J. D. Avery, C. B. Harton, W. J. Drake, J. G. Roache, J. Coyle, F. E. Beamish, A. C. Elliott, G. H. Harris, H. C. Milne, C. W. J. Panting, H. C. Hickson, P. D. Hoskins, W. R. Wakelin, F. Stewart, G. G. Rose, H. E. Combs, J. E. Hull, A. Marshall, G. F. W. Kroner, F. G. A. Eagles, C. G. Collins, T. M. Highet, J. C. A. Dudley, T. H. N. Beasley, W. I. Dawson, W. K. Frethey, J. Snell, W. Gilbert, G. L. Messenger, T. A. Churches, C. H. Clinkard, J. M. Dale, H. A. Lamb, R. Porteous, D. Rutherford, A. A. Edwards, A. Baskiville, W. A. Smith, R. H. Twose, E. White, C. Gamble, S. H. A. Levien, J. Madden, J. Alexander, P Cutforth, A. Leeden, C. B. Burdekin, J. Courtney, G. Foote, E. Bermingham, S. Brock, E. Harris, B. M. Kenny, V. Johnston, M. A. MacLeod, C. M. A. Smith, M. J. Mackellar, M. A. Asquith, E. E. Warren
Electrician—T. Buckley
Assistant Electrician—W. E. Chisholm
Mechanicians—R. Heinitz, F. Palmer
Storekeeper—J. Black
Assistant Storekeeper—C. B. Mann
Clerks in Store—C. Nicholls, T. Palmer, W. H. Carter, M. McGilvray, J. G. Howard, W. R. Aekins, J. L. Murphy, C. R. H. Robertson

Chief Postmasters.

Auckland—D. Cumming
*Thames—H. W. Capper
*Gisborne—W. H. Renner
Napier—J. H. Sheath
*New Plymouth—F. D. Holdsworth
*Wanganui—D. Miller
Wellington—J. A. Hutton
*Blenheim—E. Northcroft
*Nelson—S. P. Stevens
*Westport—H. Logie
*Greymouth—G. W. Sampson
*Hokitika—D. St. George
Christchurch—J. F. McBeth
*Timaru—W. McHutcheson
*Oamaru—W. W. Beswick
Dunedin—J. W. Wilkin
*Invercargill—C. J. A. H. Tipping

Inspectors of Telegraphs.

Auckland—W. G. Meddings
Christchurch—J. W. Gannaway
Dunedin—J. Orchiston
Nelson—C. C. Robertson
Wellington—W. S. Furby

Assistant Inspectors of Post-offices.

P. Curtis (Northern District), W. J. Chaney (Central District), W. St. G. Douglas (Midland District), T. T. King (Southern District)

Officers in Charge of Telegraph Offices.

Auckland—H. F. Seager
Napier—B. H. Keys
Wellington—H. W. Harrington
Christchurch—J. W. Mason
Dunedin—J. G. Ballard

Board of Appeal.

J. McGowan, Commissioner of Taxes, Chairman (by Act)
J. K. Logan, Superintendent of Electric Lines (by Act)
F. M. Scully, Representing Postal Branch, elected
W. F. Young, Representing Telegraph Branch, elected

DEPARTMENT OF TRADE AND CUSTOMS.

Commissioner of Trade and Customs—Hon. C. H. Mills
Secretary and Inspector of Customs—W. T. Glasgow
Chief Clerk—T. Larchin
Clerks, Customs—C. H. Manson, H. S. Cordery
Cadet—G. F. McKellar
Audit—H. W. Brewer, W. A. Cameron

Collectors of Customs.

Auckland—A. Rose
Poverty Bay—W. J. Hawley
New Plymouth—J. H. Hempton

* Combined post and telegraph offices.

Napier—E. R. C. Bowen
Wellington—D. Johnston
Wanganui—A. Elliott
Nelson—R. Carter
Westport—H. J. Crowther
Greymouth—C. Colebrook
Hokitika—W. Rose
Lyttelton and Christchurch—J. Mills
Timaru—C. S. Nixon
Oamaru—T. M. Cullen
Dunedin—C. W. S. Chamberlain
Invercargill and Bluff Harbour—A. McDowell

OFFICERS IN CHARGE OF PORTS, AND COASTWAITERS.

Thames—T. C. Bayldon, Coastwaiter
Russell—H. Stephenson, Coastwaiter
Tauranga—C. E. Nicholas, Officer in Charge
Whangaroa—A. G. Ratcliffe, Coastwaiter
Whangarei—J. Munro, Coastwaiter
Mangonui—H. G. Hunt, Officer in Charge
Hokianga—G. Martin, Coastwaiter
Kaipara—J. C. Smith, Officer in Charge
Waitara—J. Cameron, Coastwaiter
Patea—J. W. Glenny, Officer in Charge
Wairau—H. A. Jackman, Officer in Charge
Picton—T. W. Lecocq, Officer in Charge
Chatham Islands—R. S. Florance, Officer in Charge

MARINE DEPARTMENT.

Minister of Marine—Hon. W. Hall-Jones
Secretary—G. Allport
Clerks—J. J. D. Grix, W. Canton
Cadets—B. W. Millier, D. H. Butcher
Cadette—M. Fisher
Marine Engineer for the Colony—W. H. Hales
Nautical Adviser and Chief Examiner of Masters and Mates—H. S. Blackburne
Weather Reporter—R. A. Edwin, Com. R.N.
Superintendent of Mercantile Marine and Examiner of Masters and Mates, Auckland—W. D. Reid
Assistant—T. A. G. Atwood
Superintendent of Mercantile Marine and Examiner of Masters and Mates—Wellington, G. G. Smith
Superintendent of Mercantile Marine and Examiner of Masters and Mates, Lyttelton—J. A. H. Marciel
Superintendent of Mercantile Marine and Examiner of Masters and Mates, Dunedin—C. E. W. Fleming
Master of s.s. "Hinemoa"—J. Bollons

INSPECTORS OF SEA-FISHERIES.

Wellington, Chief Inspector—L. F. Ayson
Russell—H. Stephenson
Whangarei—A. McDonnell
Wanganui—W. J. Campbell
Palmerston North—M. D. Stagpoole
Foxton—J. Forster
Hokitika—J. Marks
Dunedin—J. McIntyre
Bluff—P. McGrath
Napier—C. H. Pratt

HARBOURMASTERS.*

Collingwood—F. Stallard
Foxton—J. B. Hall
Hokianga—G. Martin
Kaipara—J. Christy Smith
Manukau—J. Neale
Motueka—H. L. Moffatt
Picton—T. Edwards
Port Robinson—J. Sinclair
Russell—H. Stephenson
Wairau—H. Fisk
Waitapu—S. Fittall

INSPECTION OF MACHINERY DEPARTMENT.

Chief Inspector of Machinery, Principal Engineer Surveyor of Steamers, Principal Surveyor of Ships, and Chief Examiner of Engineers and Engine-drivers—R. Duncan, Head Office, Wellington
Chief Clerk—R. P. Milne
Clerks—W. D. Andrews, J. G. Macpherson, J. M. Healy, and J. Driscoll
Cadets—W. M. Egglestone, W. J. Craig
Inspectors of Machinery, Engineer Surveyors of Steamers and Surveyors of Ships, and Examiners of Engineers and Engine-drivers:—
Auckland—H. Wetherilt, W. R. Douglas, N. D. Hood
Wanganui—S. Dalrymple
Wellington—A. Calvert, P. Grant, C. W. R. Suisted, W. Cullen, A. Ramsay

* The more important harbours are controlled by local Boards, not by the Marine Department.

Nelson—A. McVicar
Christchurch—P. J. Carman
Timaru—J. Williamson
Dunedin—A. Walker, M. Sharp
Invercargill—A. W. Bethune

Board of Examiners of Stationary, Traction, Locomotive, and Winding Engine Drivers—Robert Duncan, Chief Inspector of Machinery, M.Inst.Nav.A., M.Inst.Soc.A.Lond., Chairman; John Hayes, F.S.G.C., Inspecting Engineer of Mines; P. S. Hay, M.A., M.Inst.C.E.; R. P. Milne, Secretary

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STAMP DEPARTMENT.

Commissioner of Stamp Duties—Hon. James Carroll
Secretary for Stamps—C. A. St. G. Hickson
Chief Clerk—C. H. W. Dixon
Accountant—J. P. Murphy
Custodian and Issuer of Stamps—W. H. Shore
Clerks—V. Willeston, J. Murray
Chief Stamper—C. Howe
Cadette—C. McIntosh
Cadet—F. Acheson

Deputy Commissioners of Stamps.

Auckland—E. Bamford
Gisborne—R. N. Jones
Taranaki—T. Hutchison
Hawke's Bay—Thos. Hall
Wellington—C. A. St. G. Hickson
Wanganui—D. Miller
Nelson—W. W. de Castro
Marlborough—C. E. Nalder
Canterbury—P. G. Withers
Timaru—W. McHutchison
Otago—P. C. Corliss
Southland—R. W. Dyer
Westland—V. G. Day

LAND TRANSFER DEPARTMENT AND DEEDS REGISTRY.

Registrar-General of Land and Deeds—G. B. Davy
Secretary, Land and Deeds—C. A. St. G. Hickson

District Land Registrars and Registrars of Deeds.

Auckland—E. Bamford
Taranaki—T. Hutchison
Wellington—Wm. Stuart
Hawke's Bay—Thos. Hall
Poverty Bay—R. N. Jones
Nelson—H. W. Robinson
Marlborough—C. E. Nalder
Canterbury—G. G. Bridges
Otago—W. Wyinks
Southland—R. W. Dyer
Westland—V. G. Day

Examiners of Titles.

Auckland—E. Bamford
Taranaki—T. Hutchison
Wellington—H. Howorth
Hawke's Bay—Thos. Hall
Poverty Bay—R. N. Jones
Nelson—H. W. Robinson
Marlborough—C. E. Nalder
Canterbury—G. G. Bridges
Otago—W. Wyinks
Southland—R. W. Dyer
Westland—V. G. Day

Registrar of Joint-stock Companies.

C. A. St. G. Hickson

Registrars of Building Societies, Industrial and Provident Societies, and Assistant Registrars of Joint-stock Companies.

Auckland—E. Bamford
Taranaki—T. Hutchison
Hawke's Bay—Thos. Hall
Wellington—C. H. W. Dixon
Nelson—W. W. de Castro
Marlborough—C. E. Nalder
Canterbury—P. G. Withers
Otago—P. C. Corliss
Southland—R. W. Dyer
Westland—V. G. Day
Poverty Bay—R. N. Jones

EDUCATION DEPARTMENT.

Minister of Education (administering also Native schools, industrial schools, and the institution for deaf-mutes)—Right Hon. R. J. Seddon, P.C.
Secretary for Education and Inspector-General of Schools—George Hogben, M.A.
Assistant Secretary—Sir E. O. Gibbes, Bart.
Chief Clerk—F. K. de Castro
Clerks—R. H. Pope, F. L. Severne, F. D. Thomson, B.A., H. J. Barrett, T. G. Gilbert, J. Beck, I. Davey

Cadets—I. Robertson, B.A., C. T. Wild, B.A., M. G. D. Grant, G. P. Prichard, J. F. Cooper, F. W. Millar, A. J. H. Benge, J. Turner, K. McKenzie, H. V. Croxton, I. Johnstone
Temporary Clerks—B. Stocker, M.A., H. J. Bathgate, G G. Knight, C. G. Rees, T. McInerney
Inspector of Native Schools — W. W. Bird, M.A.
Inspectors of Technical Instruction—M. H. Browne, E. C. Isaac
Assistant Inspectors of Industrial Schools—R. H. Pope (also clerk), T. A. Walker, Miss J. Stewart (also Visiting Officer to "Inmates" at Service, &c.)
Visiting Officers to "Inmates" of Industrial Schools at Service, &c.—E. G. Hyde, Miss J. Stewart, Mrs. A. Young
Officer in charge of Public School Cadets—Lieut.-Colonel L. W. Loveday

Education Boards, with Names of Secretaries.

Auckland—V. E. Rice
Taranaki—P. S. Whitcombe
Wanganui—W. J. Carson
Wellington—G. L. Stewart
Hawke's Bay—G. T. Fannin
Marlborough—J. Smith
Nelson—S. Ellis
Grey—H. Smith, B.A.
Westland—A. J. Morton, B.A.
Canterbury North—H. C. Lane
Canterbury South—A. Bell, M.A.
Otago—P. G. Pryde
Southland—J. Neill

School Commissioners

(*Administrators of Education Reserves, with Names of Secretaries*).

Auckland—H. N. Garland
Taranaki—F. P. Corkill
Wellington—J. H. N. Wardrop
Hawke's Bay—E. P. A. Platford
Marlborough—J. Smith
Nelson—A. T. Jones
Westland—A. J. Morton
Canterbury—H. H. Pitman
Otago—C. Macandrew

Industrial Schools.

Government Schools.

Auckland Industrial School—Miss S. E. Jackson, Manager
Wellington Receiving Home—Mrs. E. S. Dick, Manager
Burnham Industrial School (Canterbury)—T. Archey, Manager
Te Oranga Home (Canterbury)—Mrs. E. T. Branting, Manager
Christchurch Receiving Home—Miss A. B. Cox, Manager
Caversham Industrial School (Otago)—G. M. Burlinson, Manager
Official Correspondent for Boarded-out Children, Otago—Miss J. Sievwright

Private Schools.

St. Mary's Industrial School, Auckland—Rev. G. H. Gillan, Manager
St. Joseph's Industrial School, Wellington—Rev. W. J. Lewis, Manager
St. Mary's Industrial School, Nelson—Rev. George Mahony, Manager
St. Vincent de Paul's Industrial School, Dunedin—Right Rev. M. Verdon, Manager

Institution for Deaf-mutes, Sumner.

Director—G. van Asch
Steward—H. Buttle

LUNATIC ASYLUMS.

Inspector—Duncan MacGregor, M.A., M.B., C.M.*
Assistant Inspectors—J. F. S. Hay, M.B., C.M., and Mrs. Grace Neill
Medical Superintendent, Auckland Asylum—R. M. Beattie, M.B.
Medical Superintendent, Christchurch Asylum—E. G. Levinge, M.B.
Medical Superintendent, Porirua Asylum—Gray Hassell, M.D.
Medical Superintendent, Wellington Asylum—W. Baxter Gow, M.D.
Medical Superintendent, Seacliff Asylum—F. Truby King, M.B.
Superintendent, Hokitika Asylum—John Downey; Medical Officer, H. Macandrew, M.B.
Superintendent, Nelson Asylum—J. Morrison; Medical Officer, W. J. Mackie, M.D.
Ashburn Hall, Waikari (private asylum)—Proprietors, Dr. E. W. Alexander and Executor of James Hume; Medical Officer, E. H. Alexander, M.B., C.M.

* Also holds appointment of Inspector of Hospitals and Charitable Institutions.

MINES DEPARTMENT.

Chief Office.

Minister of Mines—Hon. James McGowan
Under-Secretary for Mines—H. J. H. Eliott
Inspecting Engineer—John Hayes
Chief Clerk—T. H. Hamer
Clerk—H. E. Radcliffe
Analyst—J. S. Maclaurin, D.Sc., F.C.S.
Geologist—Alexander McKay, F.G.S.
Draughtsman—C. H. Pierard
Shorthand Writer—J. T. Watkins
Cadet—T. H. Sherwood

Inspectors of Mines.

Thames and Auckland Districts—James Coutts; Assistant Inspector, Thomas Ryan: Canterbury, Dunedin, and Southland Districts—E. R. Green; Assistant Inspector, Robert McIntosh; Cadet, H. Paton: West Coast Districts—R. Tennent; Assistant Inspector—A. H. Richards. Cadet—A. J. Ching

Mining Bureau.

Secretary—P. Galvin

Managers of Water-races.

Waimea-Kumara—A. Aitken
Mount Ida—R. Murray

Schools of Mines.

Lecturers and Instructors: Thames—O. G. Adams; Assistant, A. H. V. Morgan, M.A.: Reefton—J. Henderson: Coromandel — D. V. Allen: Waihi—P. G. Morgan, M.A.

Board of Examiners under "The Coal-mines Act, 1891."

The Surveyor-General; the Inspecting Engineer of Mines; the Chief Inspector of Machinery, Wellington; James Bishop; and H. A. Gordon

Board of Examiners under "The Mining Act, 1891."

Same official members as above Board, excepting the Chief Inspector of Machinery, Wellington, with the following private members: H. A. Gordon, F.G.S., Auckland; Thomas Aitken Dunlop, Thames; Patrick Quirk Caples, Reefton; and Francis Hodge, Coromandel
The Surveyor-General is Chairman of both Boards, and Mr. T. H. Hamer is the Secretary

DEFENCE DEPARTMENT.

Minister of Defence—Rt. Hon. R. J. Seddon, P.C.
Under-Secretary—
Senior Clerk—T. F. Grey
Clerk—A. J. Baker

Commandant of the N.Z. Forces.

Colonel James Melville Babington, H.M. General Staff (local Major-General)

Staff Officer of Artillery.

Major St. Leger Montgomery Moore, N.Z.M. (Captain R.G.A.)
Staff Officer Engineer Service—Captain Alick Christopher Robinson, N.Z.M. (Lieut. R.E.)
Inspecting Officer Defence Cadet Volunteers and Defence Rifle Clubs—Captain John Gethin Hughes, D.S.O., N.Z.M.

Commandant Military School of Instruction, Wellington.

Lieut.-Colonel Robert Haylock Owen, N.Z.M. (late Captain, H.M. South Lancashire Regiment)

Defence Store Department.

Storekeeper—J. O'Sullivan

New Zealand Permanent Force.

Officer Commanding—Major St. Leger Montgomery Moore, N.Z.M. (Captain R.G.A.)

Royal New Zealand Artillery.

Captain J. E. Hume
Lieutenant H. E. Pilkington
Lieutenant W. P. Wall
Lieutenant M. M. Gardner
Lieutenant G. E. B. Mickle
Lieutenant R. O. Chesney
Lieutenant S. G. Sandle

Royal New Zealand Engineers.

Lieutenant F. Symon
Lieutenant R. B. Smythe

Surgeon, Permanent Force (Wellington).

H. A. H. Gilmer

Surgeon, Permanent Force (Auckland).

John A. Laing, M.D.

Surgeon, Permanent Force (Lyttelton).

C. H. Upham, M.R.C.S.E.

Honorary Chaplain, Lyttelton Detachment Permanent Force.

Rev. E. E. Chambers

Honorary Chaplain, Wellington Detachment Permanent Force.

Rev. G. P. Davys

Hon. Captain—Robert Fraser (Lieut. R.N.R.)
Hon. Captain — Reginald Moorhouse (Lieut. R.N.R.)
Hon. Lieutenant—John Macpherson
Hon. Lieutenant—William Geo. Nelson

Officers Commanding Militia and Volunteer Districts, and Adjutants.

Auckland—Brevet-Colonel Richard Hutton Davies, C.B., N.Z.M.
Wellington — Brevet-Colonel William Holden Webb, N.Z.M., late H.M. 109th Foot; Adjutant, Captain L. J. Joyce, N.Z.M.
Canterbury — Colonel Thomas William Porter, C.B., N.Z.M.
Otago — Brevet-Colonel Alfred William Robin, C.B., N.Z.M.
Nelson — Major (temporary Lieut.-Colonel) George Cecil Burleigh Wolfe, N.Z.M., late Captain R.M.L.I.; Adjutant, Lieut. (temporary Captain) Sydney Vincent Trask, N.Z.M.

DEPARTMENT OF LANDS AND SURVEY.

Head Office.

Minister of Lands—Hon. Thomas Young Duncan
Surveyor-General and Secretary for Crown Lands—J. W. A. Marchant
Under-Secretary for Crown Lands—W. C. Kensington
Chief Draughtsman—F. W. Flanagan
Chief Clerk—F. T. O'Neill
Auditor of Land Revenue—W. G. Runcie
Accountant—R. A. Paterson
Superintendent of Village Settlements—J. E. March

Auckland District.

Assistant Surveyor-General, Chief Surveyor, and Commissioner of Crown Lands—G. J. Mueller
District Surveyors—J. Baber, jun., G. A. Martin, H. D. M. Haszard, T. K. Thompson, R. S. Galbraith, D. A. I. Barron
Assistant Surveyors—A. G. Allom, H. F. Edgecumbe
Chief Draughtsman—C. R. Pollen
Receiver of Land Revenue—T. M. Taylor

Hawke's Bay District.

Chief Surveyor and Commissioner of Crown Lands—E. C. Gold Smith
District Land Officer, Gisborne, F. S. Smith
District Surveyors—F. S. Smith, James Hay, P. A. Dalziel
Assistant Surveyor—T. Brook
Chief Draughtsman—F. Simpson
Receiver of Land Revenue—F. Bull

Taranaki District.

Chief Surveyor and Commissioner of Crown Lands—J. Mackenzie
District Surveyors—H. M. Skeet, G. H. Bullard, J. F. Frith, W. T. Morpeth
Chief Draughtsman—J. Langmuir
Receiver of Land Revenue—F. A. Cullen

Wellington District.

Chief Surveyor and Commissioner of Crown Lands—J. Strauchon
District Surveyors—J. D. Climie, F. A. Thompson, H. J. Lowe, W. J. Wheeler, J. McKay
Assistant Surveyors—J. R. Strachan, H. E. Girdlestone, E. A. Marchant
Chief Draughtsman—L. Smith
Receiver of Land Revenue—T. G. Waitt

Nelson District.

Chief Surveyor and Commissioner of Crown Lands—W. G. Murray
District Surveyors—J. A. Montgomerie, J. Snodgrass, R. T. Sadd, J. D. Thomson
Assistant Surveyor—W. C. McAlister
Chief Draughtsman and Receiver of Land Revenue—H. Trent

Marlborough District.

Chief Surveyor and Commissioner of Crown Lands—C. W. Adams
District Surveyor—D. W. Gillies
Chief Draughtsman and Receiver of Land Revenue—W. Armstrong

Westland District.

Chief Surveyor and Commissioner of Crown Lands—G. J. Roberts
District Surveyor—W. Wilson
Chief Draughtsman—T. M. Grant
Receiver of Land Revenue—A. D. A. Macfarlane

CANTERBURY DISTRICT.

Chief Surveyor and Commissioner of Crown Lands—T. Humphries
District Surveyors—T. N. Broderick, G. H. M. McClure
Chief Draughtsman—C. B. Shanks
Receiver of Land Revenue—A. A. McNab

OTAGO DISTRICT.

Chief Surveyor and Commissioner of Crown Lands—David Barron
District Surveyors—E. H. Wilmot, D. M. Calder, W. T. Neill
Chief Draughtsman—S. Thompson
Receiver of Land Revenue—G. A. Reade

SOUTHLAND DISTRICT.

Chief Surveyor and Commissioner of Crown Lands—John Hay
District Surveyors—L. O. Mathias, H. Maitland
Chief Draughtsman—G. Robinson
Receiver of Land Revenue—H. L. Welch

MEMBERS OF LAND BOARDS.

Auckland—G. J. Mueller, J. Renshaw, A. R. Harris, M. W. Armstrong, H. J. Greenslade
Hawke's Bay — E. C. Gold Smith, T. Hyde, R. R. Groom, C. R. Baines
Taranaki — J. Mackenzie, J. Heslop, James Rattenbury, J. B. Connett, J. McCluggage
Wellington—J. Strauchon, A. Reese, J. Stevens, T. H. Robinson, J. Dawson
Nelson—W. G. Murray, O. Lynch, R. Kerr, J. S. Wratt, G. Walker
Marlborough—C. W. Adams, J. Redwood, A. P. Seymour, H. M. Reader, G. Renner
Westland—G. J. Roberts, A. Matheson, J. S. Lang, A. Cumming, M. Pollock
Canterbury — T. Humphries, A. C. Pringle, J. Sealy, J. Allan, J. Stevenson
Otago—D. Barron, H. H. Kirkpatrick, H. Clark, J. Duncan, W. Dallas
Southland—J. Hay, A. Kinross, J. McIntyre, D. King, J. McLean

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DEPARTMENT OF ROADS.

HEAD OFFICE.

Minister in Charge — Hon. W. Hall-Jones
Chief Engineer of Roads—C. W. Hursthouse
Chief Clerk—W. S. Short (solicitor)
Chief Accountant—H. J. Knowles
Assistant Accountant—J. R. Smyth
Assistant Road Engineer—E. C. Robinson
Clerks—A. Arthur, J. O. Anson, W. Barclay, F. Blake, C. E. Bennett, J. Connell, A. W. Innes, F. Mueller, J. B. Poynter, N. J. Ryan
Cadette—R. B. Orr
Cadets—E. H. Baker, J. W. Black, J. D. Brosnan, R. F. Madden, G. H. Murray, J. M. Tudhope

District Officers.

District Road Engineers—Auckland, A. B. Wright; Te Kuiti, T. Burd; Rotorua, A. C. Turner; Hawke's Bay, D. N. McMillan; Taranaki, G. T. Murray; Wanganui, R. H. Reaney; Wellington, G. F. Robinson; Marlborough, C. H. Williams; Canterbury, F. B. Wither; Otago, W. D. R. McCurdie; Southland, J. H. Treseder
Assistant Road Engineers — Auckland, A. H. Vickerman; Rotorua, C. B. Turner, E. M. Donaldson; Te Kuiti, W. H. Adams, A. Julian; Wellington, T. Carroll
District Accountants—Auckland, G. A. Kallender; Wellington, R. Howe
Clerks — Auckland, H. J. Kallender; Rotorua, W. J. Wiggs; Te Kuiti, F. H. Sims; Hawke's Bay, P. S. Foley; Taranaki, J. Clarke, C. W. Richards; Wanganui, F. Manson, W. Merson, J. R. Cade; Wellington, P. J. Moran, S. d'A. Grut, T. C. Duncan; Nelson, J. A. Hay; Marlborough, F. H. Ibbetson; Westland, C. McFarlane; Canterbury, P. W. Willson; Otago, W. H. Trimble, R. W. Gill; Southland, M. J. Aitkin
Cadets — Auckland, M. H. Hampson; Wanganui, H. A. Joyce; Southland, J. P. Larkin
Draughtsmen—Auckland, R. C. Anderson; Rotorua, F. I. Ellis; Te Kuiti, J. T. Kirkby; Hawke's Bay, P. S. Reaney, W. H. Gilmour; Taranaki, F. A. Tregelles; Wellington, G. R. Ibbetson
Road Inspectors — Auckland, G. G. Menzies, R. J. Baff, R. R. Menzies, R. Hill, H. H. Thompson, S. R. James, J. Higgins; Rotorua, J. A. Brownlie; Hawke's Bay, T. H. Strauchon, P. Gallagher. D. G. Robertson; Taranaki, R. Barron, H. C. Strombon, E. Julian, R. D. Tosswill; Wanganui, A. L. Soufflot, R. S. Summers, G. Suther-

land, W. Waters; Wellington, W. Nathan, B. Wolff, J. C. Scott, C. Hardinge; Nelson, J. F. Rasmussen; Westland, W. Adair; Canterbury, R. H. Young, U. Hurrell; Otago, H. C. Sutton; Southland, B. Marr, W. Y. Millar

Bridge Inspectors — Te Kuiti, M. W. Forsyth; Wanganui, H. J. Hayns; Wellington, D. Hughes, S. W. Jones

Overseers — Rotorua, W. Fairley, Te Kuiti, W. J. Worthington, W. Bond, J. Williamson; Hawke's Bay, J. Allison; Taranaki, W. Rigg; Wanganui, J. A. Rutherford, E. A. Vine; Wellington, W. Boyden, G. Whittaker, W. Whittaker; Nelson, W. Morris; Marlborough, T. James; Westland, R. Rothwell, W. L. Fleming, A. M. Beer; Otago, P. Fitzpatrick

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"THE LAND FOR SETTLEMENTS ACT, 1900."

Board of Land Purchase Commissioners.

Chairman of Board and Land Purchase Inspector—Alexander Barron

The Board consists of the Land Purchase Inspector as Chairman, the Surveyor-General, the Commissioner of Taxes—these for the whole colony—with the Commissioners of Crown Lands and a resident in the land district in which the land under negotiation is situated, who are members only for the business arising within their respective districts.

DEPARTMENT OF AGRICULTURE.

Minister in Charge—Hon. T. Y. Duncan

Head Office.

Secretary of Agriculture and Chief Inspector of Stock—J. D. Ritchie

Chief Clerk—R. Evatt

Clerk in Charge of Correspondence Branch—F. S. Pope

Clerk in Charge of Accounts Branch—J. E. D. Spicer

Clerks—Correspondence Branch: F. C. Hjorring, R. W. Atkinson, D. Sinclair, T. D. H. Hall, W. A. Pye. Accounts Branch — E. Fitzgibbon, F. C. Matthews, A. Callcott, A. E. Rowden, S. T. K. Sharp, A. McTaggart

Veterinary Division.

Pathologist and Chief Veterinarian—J. A. Gilruth, M.R.C.V.S.

Assistant Chief Veterinarian — C. J. Reakes, M.R.C.V.S.

Laboratory Assistant—G. H. Barker

Clerks—H. E. Carey, D. L. Luxford, C. Aston

Veterinarians (Ms.R.C.V.S.) — H. C. Wilkie (F.R.C.V.S., F.Z.S.), Dunedin; J. Lyons, Auckland; C. R. Neale, Gisborne; A. R. Young, New Plymouth; S. Burton, Palmerston North; J. G. Clayton, Wellington

Veterinarians and Meat Inspectors (Ms.R.C.V.S.) — A. Crabb, Christchurch; D. H. Rait, Hastings; J. R. Charlton, Islington; T. G. Lilico, Timaru; J. A. K. Towers, Ngahauranga; D. Machattie, Ashburton; J. Kerrigan, Invercargill; V. A. Bankes, Wanganui; F. C. Robertson, Belfast; W. H. Hawthorn, Auckland; W. G. Taylor, Napier; W. D. Snowball, Dunedin; A. W. Barnes, Nelson; T. Cunningham, Mataura; D. Spilman, Petone; P. M. Edgar, Aramoho; F. Glover, Waitara; W. C. Quinnell, Pareora

Meat Inspectors—H. S. S. Kyle, Invercargill; H. Marsack, Auckland; F. Beattie, Paeroa; J. Jarman, Thames; C. J. Barron, Blenheim; G. W. Mitchell, Lyttelton; E. T. B. Worthy, Hawera; T. J. Reakes, New Plymouth; F. Stewart, Gore

Assistant Meat Inspectors — A. G. Howard, A. D. Gillies, J. Millea, W. H. Rodney, G. W. Rait, B. Thomson, H. W. Binney, J. Preston, B. Ferguson, G. Thomson, C. J. Stone, T. Anderson, S. T. Evatt, W. A. P. Sutton, W. S. Carswell, A. M. R. Mills, W. C. Moore, J. C. Mackley, W. T. Wynyard, G. B. Williams

Dairy Division.

Dairy Commissioner—J. A. Kinsella

Clerk—D. Bray

Dairy Instructors—W. M. Singleton, A. G. Shirley, J. Pedersen

Dairy Instructors and Dairy-produce Graders, D. Cuddie, D. Dickie, W. Wright, Wellington; S. A. Dumbleton, Patea; L. Hansen, New Plymouth

Dairy-produce Graders—A. A. Thornton, Lyttelton and Port Chalmers; J. Johnston, New Plymouth; E. Townshend, Auckland; E. A. Dowden, Wellington

Clerks to Graders—J. Fleming, R. F. Crosbie, J. Hutton

Biological and Horticultural Division.

Biologist—T. W. Kirk, F.L.S.
Assistant Biologist—A. H. Cockayne
Clerks—J. H. Kingdon, B. Clarry
Assistant Entomologist—Auckland, Captain T. Broun, F.E.S.
Pomologists — North Island, W. J. Palmer, W. A. Boucher. South Island, J. C. Blackmore
Fruit Inspectors—Auckland, Captain T. Broun, F.E.S.; Wellington, H. Palethorpe; Christchurch, A. C. Smale; Dunedin, A. F. Cargill

Poultry Division.

Poultry Expert—D. D. Hyde
Clerk—G. A. Ross
Poultry Graders — Auckland, R. W. Pounsford; Wellington, T. Burke; Christchurch, S. Newton; Dunedin, T. F. Leihy
Poultry-station Managers—Ruakura, C. Cussen; Momohaki, H. C. Collett; Burnham, Leslie Hill; Milton, F. Brown

Fibre Division.

Chief Fibre Expert—C. J. Fulton.
Fibre Graders—Auckland, W. H. O. Johnston; Wellington, R. T. Bell, W. H. Middlemiss; Bluff, W. J. Shea
Clerk, Wellington—H. Wynn-Williams

Viticultural Division.

Viticultural Expert—R. Bragato
Vine Inspector—A. T. Potter

Bone-sterilising Division.

Superintendent of Bone-sterilising—F. G. Lawrie

Chemical Division.

Chemist—B. C. Aston, F.C.S.
Assistant Chemist — H. W. Lawrence, F.C.S.
Laboratory Assistant—

Statistical Division.

Compiler of Statistics—E. B. Burdekin
Clerk—A. C. Philpott

Experimental Farms.

Overseers — Waerenga, N. Kensington; Ruakura, M. Mulcahy; Weraroa, G. Ross; Momohaki, F. Gillanders; Te Mata (Hawke's Bay), S. F. Anderson
Clerks—Ruakura, D. Edwards; Weraroa D. N. Cole

Live-stock Quarantine Station

Caretakers — Auckland, Thomas Hill; Wellington, J. P. Ross; Lyttelton, W. J. Thomas

Inspectors of Stock.

Auckland District — Ohaeawai, D. A. Graham; Whangarei, *J. T. Stone; Auckland, *E. Clifton (in charge of district), F. H. Brittain, R. Hull, Hamilton, *D. Ross; Kihikihi, J. Kerr; Tauranga, A. H. Burkill
Hawke's Bay District — Gisborne, *C. Thomson and D. Fleming; Wairoa, *W. R. Rutherfurd; Napier, *W. Miller (in charge of district); Hastings, F. G. Wayne; Woodville, J. Harvey
Wairarapa District—Masterton, *G. H. Jenkinson (in charge of district); Carterton, T. C Webb
Wellington District — Wellington, *A. Mills (in charge of district), J. Drummond (port)
Manawatu District—Palmerston North, *J. Duncan (in charge of district)
West Coast (North Island) District—Hunterville, V. A. Huddleston; Wanganui, *A. K. Blundell (in charge of district); Hawera, *J. W. Deem; Stratford, J. Budge; New Plymouth, R. Rowan
Marlborough District — Blenheim, *J. Moore (in charge of district)
Canterbury District — Rotherham, *J. Munro; Rangiora, C. A. Cunningham; Christchurch, *H. T. G. Turner (in charge of district); Lincoln, J. C. Miller; Ashburton, B. Fullarton; Timaru, J. C. Huddleston; Fairlie, W. Black
Southern District — Dunedin, T. A. Fraser, Assistant Chief Inspector in charge of district), *J. E. Thomson (port); Kurow, W. Wills; Oamaru, *A. Ironside; Palmerston South, H. Hill; Mosgiel, R. I. Gossage; Naseby, C. Shaw; Clyde, *S. M. Taylor; Lawrence, *G. McLeod; Milton, T. Gillespie; Balclutha, J. L. Bruce; Gore, W. Dalgliesh; Invercargill, *R. Wright; Bluff, J. W. Raymond (port); Riverton, T. Gilmour; Queenstown, R. Fountain
Westland District — Hokitika, *C. C. Empson (in charge of district)

* Also Registrar of Brands.

Nelson District—Nelson, G. S. Cooke (in charge of district)
Relieving Inspector of Stock, D. Munro

Registrars of Brands.

(The Inspectors of Stock marked * are also Registrars of Brands.)
Auckland, W. C. Robinson; Wanganui, D. Bell; Nelson, A. T. P. Hubbard
Clerks — Auckland, W. C. Robinson; Napier, R. M. Miller, W. McN. Miller; Masterton, R. J. Harcombe; Wellington, V. A. Mills; Palmerston North, W. Nettlefold; Wanganui, D. Bell; Blenheim, G. J. Ward; Christchurch, J. Longton, R. F. Crosbie; Timaru, W. Pogson; Dunedin, R. F. Cameron; Lawrence, E. Fowler; Invercargill, J. W. Bell, R. L. Johnston

Inspectors under Slaughtering Act.

(The Inspectors of Stock are also Inspectors under the Slaughtering Act.)
F. Beattie, Paeroa; J. Jarman, Thames; E. T. B. Worthy, Hawera; A. Macpherson, Christchurch; F. Stewart, Gore

Inspectors of Dairies.

(The Inspectors of Stock are also Inspectors of Dairies.)
Auckland, G. M. Williamson; Paeroa, F. Beattie; Thames, J. Jarman; Napier, J. G. Parker; New Plymouth, T. J. Reakes; Hawera, E. T. B. Worthy; Wellington, J. Drummond; Lyttelton, G. W. Mitchell; Christchurch, A. Macpherson; Blenheim, C. J. Barron; Dunedin, W. R. Brown; Nelson, A. T. P. Hubbard; Gore, F. Stewart

Inspectors of Noxious Weeds.

(The Inspectors of Stock are also Inspectors of Noxious Weeds.)
Napier, J. G. Parker; Matapu, J. Heslop; Waitara, J. M. Hignett; Dunedin, W. R. Brown; Invercargill, M. O'Meara; Nelson, A. T. P. Hubbard; Hamilton, E. Seddon; Otahuhu, A. Dickson; Hamilton, J. G. Scott; Hunterville, R. Crockett; Stratford, F. Arden

Inspectors under Rabbit Nuisance Act.

(The Inspectors of Stock are also Inspectors under the Rabbit Nuisance Act.)

Rabbit Agents.

Cambridge, J. S. Scott, R. Alexander; Kihikihi, B. Bayly; Pahiatua, T. Bacon; Masterton, J. Halligan; Tauweru, H. Munro; Alfredton, H. S. Ussher; Carterton, A. C. Hackworth; Johnsonville, W. Ross; Levin, W. S. Goodall; Blenheim, G. Gee; Martinborough, W. R. Taylor; Kaikoura, F. W. Sutton; Mount Somers, C. Watson; Fairlie, W. Johnston; Timaru, D. Elliott; Waimate, E. F. Sullivan; Hanmer, C. S. Neville; Kurow, C. S. Dalgleish; Maheno, F. McKenzie; Inch Valley, M. McLeod; Waikouaiti, F. Urquhart; Taieri, H. McLeod; Otago Peninsula, A. Munro; Sutton, R. Irving; Waipiata, B. Grant; Clyde, A. Clarke; Roxburgh, J. G. Johnston; Lawrence, D. Maider; Pembroke, H. A. Munro; Milton, C. Branigan; Owaka, F. W. Blair; Tapanui, A. C. Clapcott; Clinton, T. P. Short; Gore, A. Hughes; Lumsden, W. M. Munro; Wyndham, D. McLeod, J. C. Robinson; Invercargill, J. McKellar; Riverton, T. N. Baxter

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VALUATION DEPARTMENT.

Minister in Charge—Hon. C. H. Mills.
Valuer General—John McGowan
Deputy Valuer-General—G. F. C. Campbell
Chief Clerk—F. J. M. D. Walmsley
Clerk in Charge—A. E. Fowler
Clerks—H. L. Wiggins, G. Halliday, J. T. Bolt, J. Atkinson, E. J. R. Cumming, C. J. Lovatt
Draughtsman—H. H. Seed
Officers in Charge — A. J. McGowan, Auckland; R. Hepworth, Christchurch; A. Clothier, Dunedin; T. Oswin, Invercargill
District Valuers—James I. Wilson, jun., Whangarei; W. Garrett, J. J. Reynolds, Auckland; W. H. Wallis, Hamilton; W. E. Griffin, Napier; H. J. C. Coutts, Hawera; S. Hill, New Plymouth; A. Barns, Wanganui; R. Gardner, Palmerston North; J. Fraser, Masterton; J. Ames, Wellington; T. W. Caverhill, Petone; E. Kenny, Picton; J. Glen, Nelson; J. Webster, Hokitika; A. D. Bayfield, Westport; H. Murray, Christchurch; A. Freeman, Christchurch; A. Allan, Timaru; E. A. Atkinson, Oamaru; W. L. Craig,

Palmerston South; J. Wright, Dunedin; R. Milne, Milton; J. George, Queenstown; John Smaill, Gore; Charles Rout, A. Pyper, Invercargill
Clerks—Auckland, T. C. Somers; Christchurch, J. M. Wheeler, A. Millar; Dunedin, ; Invercargill, C. de R. Andrews
Cadets—Auckland, E. Panting; Wellington, F. C. Douglas; Invercargill, D. Corcoran
Cadettes—Auckland, F. B. Robertson; Wellington, G. E. Davidson, M. F. McLean; Christchurch, N. Smythe; Dunedin, M. J. Drysdale

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GOVERNMENT INSURANCE DEPARTMENT.

Commissioner—J. H. Richardson, F.F.A., F.I.A.V.
Assistant Commissioner—D. M. Luckie
Actuary—Morris Fox
Secretary—W. B. Hudson
Accountant—G. W. Barltrop
Chief Medical Officer—T. Cahill, M.D.
Assistant Actuary—P. Muter
Chief Clerk—R. C. Niven
Office Examiner—G. A. Kennedy
Clerks—J. W. Kinniburgh, A. Avery, W. S. Smith, A. H. Hamerton, F. B. Bolt, T. L. Barker, A. L. B. Jordan, H. S. Manning, C. E. Galwey, A. T. Traversi, G. Webb, F. K. Kelling, J. B. Young, H. Rose, R. P. Hood, G. A. N. Campbell, J. A. Thomson, A. de Castro, R. T. Smith, H. L. Levestam, C. J. Alexander, S. P. Hawthorne, J. G. Reid, C. H. E. Stichbury, J. R. Samson, R. Fullerton, A. H. Johnstone, G. S. Nicoll, R. S. Latta, T. Fouhy, G. E. Sadd, W. H. Woon, W. Spence, J. J. Feeney, W. J. Ewart, H. Wylie, T. M. Dimant, B. Trevithick
Chief Messenger—W. Archer

Auckland Agency.

District Manager—W. J. Speight
Chief Clerk—J. K. Blenkhorn
Clerk—C. H. Ralph

Napier Agency.

Resident Agent—J. H. Dean

Wanganui Agency.

Resident Agent—A. E. Allison
Clerk—F. D. Banks

Wellington Agency.

District Manager and Supervisor of New Business—G. Robertson
Chief Clerk—M. J. K. Heywood
Clerks—W. C. Marchant, A. M. McDonald, G. H. Brialey

Nelson Agency.

Resident Agent—A. P. Burnes

Greymouth Agency.

Resident Agent—Geo. Crichton

Christchurch Agency.

District Manager—J. C. Prudhoe
Chief Clerk—J. W. H. Wood
Clerks—G. J. Robertson, H. Mouat

Timaru Agency.

Resident Agent—S. T. Wicksteed

Oamaru Agency.

Resident Agent—A. W. G. Burnes

Dunedin Agency.

District Manager—R. S. McGowan
Chief Clerk—O. H. Pinel
Clerk—A. Marryatt

Invercargill Agency.

Resident Agent—J. Findlay
Clerk—J. Hendry

PUBLIC TRUST OFFICE.

Public Trustee—J. W. Poynton
Deputy Public Trustee and Chief Clerk—A. A. K. Duncan
Solicitor—F. J. Wilson
Inspector—T. S. Ronaldson
Accountant—T. D. Kendall
Examiner—A. Purdie
Clerks—T. Stephens, P. Fair, C. Zachariah, P. Hervey, E. C. Reeves, W. A. Fordham, G. A. Smyth, A. J. Cross, E. A. Smythe, K. N. H. Brown, W. Barr, E. O. Hales, S. W. Smith, C. A. Goldsmith, H. Masters, R. Price, N. M. Chesney, H. Turner, C. M. Calders, M. E. Nash, J. Menzies, E. P. Hay, R. MacGibbon, S. S. Mackenzie, O. L. Bowley, G. M. Morris, A. C. Bretherton, N. M. Macdougall, A. L. Chappell
District Agent, Christchurch — M. C. Barnett. Clerks, W. S. McGowan, G. P. Purnell, P. A. Devereux, A. K. Hadfield
District Agent, Auckland—E. F. Warren. Clerks, J. B. Jack, V. Adams, C. Robinson, A. R. Jordan

District Agent, Dunedin—F. H. Morice. Clerks, J. Allen, C. F. Young, W. Layburn

District Agent, Greymouth—T. R. Saywell

District Agent, Nelson—E. P. Watkis

West Coast Settlement Reserves Agent and District Agent, New Plymouth—Thomas W. Fisher. Clerks, H. Oswin, A. C. Campbell

ADVANCES TO SETTLERS OFFICE.

Minister in Charge—Hon. C. H. Mills.

Superintendent—John McGowan

Deputy Superintendent—G. F. C. Campbell

Chief Clerk—F. J. M. D. Walmsley

Inspecting Accountant—P. Heyes

Clerk in Charge—W. Waddell

Clerks—M. J. Crombie, W. N. Hinchliffe, H. E. Williams, J. E. Thompson, C. B. Collins, W. Auld, A. A. Prichard, A. W. Knowles, T. W. Foote, H. S. O'Rourke, C. D. Wilson, R. G. McLennan. Typist — C. T. Fraser

Cadets—A. Tudhope, J. F. O'Leary, T. W. Vickery, J. J. M. Harvey, F. J. R. Gledhill

DEPARTMENT OF PUBLIC HEALTH.

Minister of Health—Hon. Sir J. G. Ward, K.C.M.G.

Director and Chief Health Officer, &c.—J. Malcolm Mason, M.D., D.P.H., &c.

Assistant Chief Health Officers—Dr. Thomas H. Ambrose Valintine, M.R.C.S.Eng., D.P.H., &c.

Wellington: R. H. Makgill, M.D. Edin., D.P.H. Camb.

Native Health Officer — Dr. Maui Pomare

Chief Clerk—J. H. McAlister

Clerks—H. B. Magrath, T. P. Butler, H. Eastgate, J. W. Taylor, L. J. Ell. Typistes, Gwenllian Craig, G. Martelli

Pathologist—J. A. Gilruth, M.R.C.V.S.

Analysts—Wellington, J. S. McLaurin; Auckland, J. A. Pond; Dunedin, J. G. Black; Christchurch, A. W. Bickerton

District Health Officers — Blenheim, Dr. W. Anderson; Napier, Dr. F. I. De Lisle; Auckland, Dr. J. P. Frengley; Dunedin, Dr. F. Ogston; Christchurch, Dr. H. E. Finch; Greymouth, Dr. C. G. Morice

Port Health Officers—Picton, Dr. W. E. Redman; Oamaru, Dr. A. Douglas; Wanganui, Dr. R. C. Earle; Port Chalmers, Dr. G. Hodges; Wellington, Dr. H. Pollen; Westport, Dr. M. Mackenzie; Greymouth, Dr. C. G. Morice; Timaru, Dr. E. T. Thomas; Onehunga, Dr. W. G. Scott; Auckland, Dr. E. W. Sharman; Kaipara, Dr. F. M. Purchas; Whangarei, Dr. G. B. Sweet; Bluff, Dr. J. Torrance; Lyttelton, Dr. C. H. Upham; Gisborne, Dr. J. W. Williams; Napier, Dr. T. C. Moore; New Plymouth, Dr. H. A. McClelland.

Sanitary Inspectors — Dunedin, W. E. Gladstone; Wellington, C. A. Schauer; New Plymouth, A. H. Kendall; Auckland, C. C. Winstanley; Napier, M. Kershaw; Nelson, C. Middleton; Christchurch, D. Munro; Invercargill, K. Cameron; Marton, F. C. Wilson; Masterton, G. H Dolby.

Cadets in Government Service to be Volunteers.

Cadets in the Civil Service are required, after arriving at the age of eighteen years, to serve for three years in a Volunteer corps. Heads of Departments are required to see that cadets who come within the regulations join the Volunteer Force, and serve for the period named, and also to notify the Under-Secretary for Defence of the appointment of all cadets coming within this regulation.

ECCLESIASTICAL.

There is no State Church in the colony, nor is State aid given to any form of religion. Government in the early days set aside certain lands as endowments for various religious bodies, but nothing of the kind has been done for many years past.

Church of the Province of New Zealand, commonly called the "Church of England."

Bishops.

The Most Rev. Samuel Tarratt Nevill, D.D., Dunedin; consecrated 1871, Primate.

The Right Reverend Moore Richard Neligan, D.D., Auckland; consecrated 1903.

The Right Rev. William Leonard Williams, D.D., Waiapu; consecrated 1895.

The Right Rev. Frederic Wallis, D.D., Wellington; consecrated 1895.

The Right Rev. Charles Oliver Mules, M.A., Nelson; consecrated 1892.

The Right Rev. Churchill Julius, D.D., Christchurch; consecrated 1890.

The Right Rev. Cecil Wilson, M.A., Melanesia; consecrated 1894.

Roman Catholic Church.

Archbishop.

The Most Rev. Francis Redwood, S.M., D.D., Archbishop and Metropolitan, Wellington; consecrated 1874.

Bishops.

The Right Rev. George Michael Lenihan, D.D., Auckland; consecrated 1896.

The Right Rev. John Joseph Grimes, S.M., D.D., Christchurch; consecrated 1887.

The Right Rev. Michael Verdon, D.D., Dunedin; consecrated 1896.

Annual Meetings and Officers.

The principal present heads or officers of the various churches, and the places and times of holding the annual or periodical assemblies or meetings, are as follow:—

Church of England.—For Church purposes, the colony is divided into six dioceses, viz.: Auckland, Waiapu, Wellington, Nelson, Christchurch, and Dunedin. The General Synod meets every third year in one or other of the dioceses. Representatives attend from each diocese, and also from the diocese of Melanesia.—President, the Bishop of Dunedin, Primate. The Diocesan Synods meet once a year, under the presidency of the Bishop of the diocese. The next General Synod will be held in Dunedin, on the 28th January, 1907.

Roman Catholic Church.—The diocese of Wellington, established in 1848, was in 1887 created an Archdiocese and the metropolitan see. There are three suffragan dioceses—Auckland, Christchurch, and Dunedin. A Retreat is held annually in each of the four dioceses, at the end of which a Synod is held, presided over by the Bishop, and at which all his clergy attend.

In January, 1899, the first Provincial Council of New Zealand was held in Wellington, under the presidency of the Metropolitan, and attended by all the Suffragan Bishops, and a number of priests elected specially in each diocese as representatives of the whole Catholic clergy in the colony. The decrees of this Council were approved by Rome in April, 1900, were published on 1st January, 1901, and are now binding in every diocese in the colony.

Presbyterian Church of New Zealand.—The General Assembly will meet on the second Tuesday of November, 1904, in St. John's Church, Wellington; and thereafter, on ordinary occasions, alternately in Wellington and Dunedin. Moderator, the Rev. Michael Watt, D.D., Dunedin; Clerk and Treasurer, Rev. David Sidey, D.D., Napier; Theological Professors, Rev. John Dunlop, M.A., D.D., and Rev. Michael Watt, M.A., D.D.; and Mr. James Dunbar, tutor in Greek.

Methodist Church of Australasia in New Zealand.—The annual New Zealand Conference meets on or about the last Tuesday in February, the exact date being determined by the President, who holds office for one year. Each Conference determines where the next one shall assemble. President (1904–5), Rev. S. Lawry, Christchurch; Secretary, Rev. C. H. Laws, Dunedin. The next Conference is to meet in Wesley Church, Taranaki Street, Wellington.

Primitive Methodist Connexion.—A Conference takes place every January. The next is to be held at Christchurch, commencing 11th January, 1905. The Conference officials for the present year are: President, Rev. E. Drake, Wanganui; Vice-President, J. Embury, Esq., Wellington; Secretary, Rev. R. Raine, Invercargill; Hon. District Secretary, Mr. D. Goldie, Pitt Street, Auckland; Treasurer of Mission Funds, Mr. Joseph Watkinson, Mangere, Auckland.

Baptist Union of New Zealand.—President, Gilbert Carson, Esq., Wanganui; Vice-President, Rev. J. M. B. Bennett, B.A., Dunedin; Secretary, Rev. J. North, Oamaru; Treasurer, Mr. A. Chidgey, Christchurch. The Union comprises 39 churches, 25 preaching-stations, 3,885 members, and a constituency of 17,000. The denominational organ is the *New Zealand Baptist*, Editor, Rev. F. W. Boreham, Mosgiel. The Foreign Missionary Society, with an average income of £1,200, employs a doctor, a missionary, three zenana ladies, and 13 native helpers. The sphere of operations is in North Tipperah, East Bengal.

Congregational Union of New Zealand.—The annual meetings are held during the month of February, at such place as may be decided on by vote of the Council. Chairman for 1904–1905, Rev. John Wilkins, Auckland; Chairman-elect, Mr. F. Meadowcroft,

Wellington; Secretary, Rev. A. T. Lee, Devonport, Auckland; Treasurer, Mr. W. H. Lyon, Auckland; Registrar, Mr. A. M. Lewis, Wellington; Head Office, Auckland. In 1905 the meeting of the Council will be held at Christchurch. The Committee of the Union meets in Auckland on the second Tuesday of each month.

Hebrews.—Ministers: Rev. S. A. Goldstein, Auckland; Rev. H. van Staveren, Wellington; Rev. I. Zachariah, Christchurch; Rev. A. T. Chodowski, Dunedin; Mr. Alexander Singer, Hokitika. Annual meetings of the general Congregations are usually held at these places during the month of Elul (about the end of August).

DEFENCES, MILITARY AND NAVAL.

The defence forces consist of the Royal N.Z. Artillery and Royal N.Z. Engineers, and the auxiliary forces of Volunteers, Field Artillery, Garrison Artillery, Engineers (submarine mining and field), Mounted Rifles, Rifle, Cycle, Bearer companies, and Defence Rifle Clubs. There is a Commander of the Forces, who is an Imperial officer. A Royal Artillery officer is Staff Officer for Artillery. A Royal Engineer officer is Staff Officer for Engineer services. To the Under-Secretary for Defence all questions of expenditure are referred.

Military Instruction.

A School of Military Instruction has been established, with headquarters at Wellington.

Militia and Volunteer Districts.

The two islands (North and Middle) are divided into five military districts, each commanded by an officer of Field rank, with an Adjutant and clerical staff, besides a staff of N.C.O.'s, mostly drawn from the Imperial Army, for instruction of Volunteers.

Royal N.Z. Artillery.

This Force is divided into four detachments, which are stationed at Auckland, Wellington (head-quarters), Lyttelton, and Dunedin; their principal duties are to look after and take charge of all guns, ordnance stores, ammunition, and munitions of war at these four centres. The Force has an establishment of 270 rank and file.

Royal N.Z. Engineers.

This branch is divided between Auckland and Wellington, with small detachments at Lyttelton and Port Chalmers, and has an establishment of 96 of all ranks. They have charge of two submarine mining steamers of the "Sir F. Chapman" class, and of all submarine mining and electric light stores.

Volunteers.—Field Artillery.

There are five batteries of Field Artillery (two in the North Island and three in the Middle Island), with a total of 382 (25

officers, 357 rank and file) of all ranks. They are armed with 15-pounder B.L. and 6-pounder Nordenfeldts, on field-carriages, and go into camp annually for sixteen days.

Volunteers.—Naval and Garrison Artillery.

There are five Garrison Artillery Corps in the North Island, and five in the Middle Island, comprising in all a total of 54 officers and 861 rank and file. They go into camp annually for sixteen days.

Volunteers.—Engineers.

There are six Engineer corps, two Submarine Mining and four Field corps, with a total strength of 479 of all ranks. The Submarine Miners have cutters, &c., provided, and are instructed in rowing, knotting, splicing, signalling, and other duties pertaining to this branch of the service. Attendance at an annual camp is also compulsory. The Field Engineers, besides carrying rifles, are provided with entrenching tools and all appliances for making and blowing up bridges or laying land-mines.

Volunteers.—Mounted Rifles.

There are forty-two corps of Mounted Rifles in the North Island and thirty-one in the Middle Island, with a total strength of 4,537 of all ranks. These corps go into camp for an annual training of six days.

Volunteers.—Rifle Corps.

In this branch of the service there are a hundred and twenty-four corps, fifty-nine being in the North Island and sixty-five in the Middle Island, with a total strength of 7,313 of all ranks, including garrison bands.

Volunteers.—Cycle Corps.

There are Volunteer cycle corps at Wellington, Christchurch, Nelson, and Dunedin, of a maximum strength of two officers and twenty-five non-commissioned officers, rank and file: they are attached to the infantry battalions at those centres.

Volunteers.—Bearer Corps.

Volunteer bearer corps at Auckland, Wellington, Christchurch, and Dunedin are of a maximum strength of three officers and fifty non-commissioned officers, rank and file. There is also a bearer corps at Nelson of a maximum strength of two officers and twenty-five non-commissioned officers, rank and file.

Volunteers.—Cadet Corps.

There is a force of fifty-three cadet corps—viz., twenty-eight in the North Island and twenty-five in the Middle Island, with a total strength of 2,773 of all ranks.

Defence Rifle Clubs.

These have lately been established by the Government. Members can purchase rifles at cost price from Government. An annual grant of ammunition is made to those members who fulfil conditions as to quarterly drills. There are 100 rifle clubs, comprising 2,416 members.

Arms, etc.

The whole of the adult portion of the Force have Lee-Enfield carbines or rifles; Cadets being armed with magazine Lee-Enfield and Martini-Enfield carbines. Defence rifle clubs are armed with magazine Lee-Enfield rifles.

Enrolment, etc.

Members of the Permanent Forces are enrolled to serve for a period of eight years from enrolment, the last three years of such being in the Reserve; adult Volunteers for three years. The Permanent Forces are principally recruited from men who have one year's efficient service in the Volunteers. After passing the gunnery and other courses and serving three years in the Permanent Forces the men are eligible for transfer to police and prison services.

Instructors.

The Instructors for artillery and engineer and submarine mining corps are obtained from the School of Gunnery at Shoeburyness, and from the Royal Engineers, under a three years' engagement, on completion of which they return to their regiments.

Capitation.

An annual capitation of £2 10s. is granted to each efficient Volunteer, and 5s. to each efficient cadet. One hundred and fifty rounds of ball-cartridge are issued each year free to every adult Volunteer, and fifty rounds to each cadet over thirteen years of age.

Administration.

The defence forces of New Zealand are administered under "The Defence Act, 1886," and "The Defence Act Amendment Act, 1890."

Expenditure on the Establishment and Maintenance of Defences from 1897–98 to 1903–1904.*

Year.	Military Expenditure.	Harbour Defences.	Total.
	£	£	£
1897–98	83,004	2,525	85,529
1898–99	114,789	10,158	124,947
1899–1900..	184,970	5,328	190,298
1900–1901..	156,218	3,960	160,178
1901–1902..	250,478	6,678	257,156
1902–1903..	292,081	6,126	298,207
1903–1904..	221,959	2,885	224,844

* The special expenditure on account of contingents for South Africa is not included.

DÉPÔTS FOR SHIPWRECKED MARINERS.

Eleven of the crew of the barque "Spirit of the Dawn," which was wrecked on Antipodes Island on the 4th September, 1893, remained on the island for eighty-eight days without becoming aware of the existence of the dépôt of provisions and clothing for castaways which is established there. Attention is now drawn to the fact that such dépôts are maintained by the New Zealand Government on that island, and on the Auckland, Campbell, Bounty, Kermadec, and Snares Islands.

The following are the positions of the dépôts:—

Auckland Islands.—A dépôt is placed on the south side of Erebus Cove, Port Ross, and another in Camp Cove, Carnley Harbour, and a third at the head of Norman Inlet. One boat is placed on the north-west end of Adams Island, another on Enderby Island, and another on Rose Island.

Campbell Island.—A dépôt is erected in Tucker Cove, Perseverance Harbour, and a boat has been placed at the head of that harbour.

Antipodes Islands.—A dépôt is placed abreast the anchorage on the north-east side of the principal island.

Bounty Islands.—There is a dépôt on the principal island.

Snares Island.—A dépôt has been established on this island in Boat Harbour.

Kermadec Islands.—A dépôt is established on Macaulay Island, near Lava Cascade, on the north-east end of the island, and another on Curtis Island, at the head of Macdonald Cove, on the north-western end of the island.

Finger-posts to indicate the direction of the dépôts have also been put up.

The Government steamer visits the Auckland, Campbell, Antipodes, Bounty, and Snares Islands twice a year, and the Kermadec Islands once a year, and one of His Majesty's ships calls at the Auckland, Campbell, Antipodes, and Bounty Islands twice a year, the visits being made about midway between the trips of the Government steamer.

GRAVING DOCKS AND PATENT SLIPS.

Vessels visiting New Zealand, and requiring docking or repairs, will find ample accommodation at the principal ports of the colony.

There are in New Zealand four graving-docks; two of these are situated in Auckland, one at Lyttelton, and one at Port Chalmers.

Auckland Docks.

The Auckland Docks are the property of the Auckland Harbour Board, and cost, with machinery, appliances, &c., £250,300. The dimensions of the docks at Auckland are as follow:—

	Calliope Dock.	Auckland Dock.
Length over all	525 feet.	312 feet.
Length on floor	500 „	300 „
Breadth over all	110 „	65 „
Breadth on floor	40 „	42 „
Breadth at entrance	80 „	43 „
Depth of water on sill (at high water ordinary spring tides)	33 „	13½ „

Alterations have been made to the lower altars of Calliope Dock which will enable vessels of 63 ft. beam to be docked without any difficulty.

The following is the scale of charges for the use of the Auckland and Calliope Graving Docks and appliances:—

Auckland Graving Dock.	£	s.	d.
Entrance fee	1	1	0
For every vessel of 100 tons (gross register), or under, per day	5	0	0
For every vessel from 101 to 200 tons (gross register), per day	6	0	0
For every additional ton (gross register), per day ..	0	0	2

Twenty per cent. reduction on the above rates will be allowed when two or three vessels dock on the same tide, and remain in dock the same number of hours, but such reduction will not be allowed if any of the Auckland Harbour Board's vessels are docked at the same time as another vessel.

For shores cut in docking or hanging the vessel, there must be paid, according to injury done, such amount as may be fixed by the Dockmaster.

For use of steam-kiln, 10s. per day.

For use of pitch furnace, 10s. per day.

Calliope Graving Dock.	£	s.	d.
Entrance fee	5	5	0
For all vessels up to 300 tons (gross register), for four days or less	20	0	0
For all vessels 301 to 400 tons „ „	22	10	0
„ 401 to 500 tons „ „	25	0	0
„ 501 to 600 tons „ „	27	10	0
„ 601 to 700 tons „ „	30	0	0
„ 701 to 800 tons „ „	32	10	0
„ 801 to 900 tons „ „	35	0	0
„ 901 to 1,000 tons „ „	37	10	0
„ 1,001 to 1,100 tons „ „	40	0	0
„ 1,101 to 1,200 tons „ „	45	0	0
„ 1,201 tons (gross register) and upwards, for four days or less	50	0	0

After the fourth day in dock, the following rates will be charged:—

For all vessels up to 500 tons (gross register) ..	4d.	per ton a day.
For all vessels 501 to 1,000 tons (gross register) ..	3d.	„
„ 1,001 to 2,000 tons „ ..	2¾d.	„
„ 2,001 to 3,000 tons „ ..	2½d.	„
„ 3,001 to 4,000 tons „ ..	2¼d.	„
„ 4,001 tons (gross register) and upwards	2d.	„

Twenty per cent. reduction on the above rates will be allowed when two or three vessels dock on the same tide and remain in dock the same number of hours, but such reduction will not be allowed if any of the Auckland Harbour Board's vessels are docked at the same time as another vessel.

For shores cut in docking or hanging the vessel, there shall be paid, according to injury done, such amount as may be fixed by the Dockmaster.

During the year 1903, 95 vessels of various descriptions, with a total of 33,136 tons, made use of the Auckland Graving Dock, occupying it in all 230 days, for repairs or painting.

In Calliope Dock 17 vessels were docked, with an aggregate tonnage of 27,127, and occupying the dock for 158 days.

Dock dues for the year amounted to £5,261 17s. 10d.

Under arrangement with the Admiralty, a complete plant of the most efficient and modern machinery has been provided at Calliope Dock-yard. The workshops are now erected, and all the machinery is placed in position, with the exception of the shear-legs. This plant includes 80-ton shear-legs complete, trolly to carry 80 tons and rails, 10-ton steam crane at side of dock, engines, boilers, overhead travellers; planing, shaping, and slotting machines; radial drills, vertical drills, band-saws for iron, punching and shearing machines, plate-bending rolls; 24 in.-centre gantry lathe, 70 ft. bed; 9 in. and 12 in. gantry lathes, milling-machines, emery-grinders, screwing-machines, ditto for pipes, horizontal boring-machines, Root's blower, smiths' forges (six), coppersmith's forge, levelling-slabs, steam-hammers, lead-furnace, wall-cranes, zinc-bath, plate-furnace, jib-crane for foundry, circular-saw bench, band-saw for wood, lathe for wood, general joiner, carpenters' benches (four), kiln for steaming boards, Fox's trimmer, cupola to melt 5 tons of metal, countersinking machine, pipe-bending machine, tools of various descriptions, moulders' bins, force-pumps for testing pipes, vice-benches, electric-light engines, dynamos (two), &c.; and all other appliances and machinery required to render the plant adequate to repair any of His Majesty's ships upon the station, or any merchant vessel visiting the port. The dock and machinery will be available for use, when not required for His Majesty's vessels, in effecting repairs to any merchant vessel requiring same. Electric lights have been provided for workshops, dock, and dockyard. The dockyard is now connected by telephone with the central exchange. An abundant supply of the purest fresh water is available at Calliope Dock and Calliope Wharf; and a most complete establishment of up-to-date machinery and appliances has been provided.

Wellington Patent Slip.

The Port of Wellington has no dock; but there is a well-equipped patent slip at Evans Bay, on which vessels of 2,000 tons can be safely hauled up. This slip is the property of a private company, and is in no way connected with the Harbour Board. It is 1,070ft. long, with a cradle 260ft. in length. There is a depth of 32ft. at high water at the outer end of the slip. A dolphin and buoys are laid down for swinging ships in Evans Bay.

The company has convenient workshops, which contain machinery necessary for effecting all ordinary repairs to vessels using the slip.

During the year ending 31st March, 1903, 101 vessels of various sizes, of an aggregate of 39,872 tons, were taken up on the slip for repairs, cleaning, painting, &c. The charges for taking vessels on

the slip and launching them are 1s. per ton on the gross tonnage for the first full twenty-four hours, and 6d. per ton per day afterwards, unless by special agreement.

Lyttelton Dock and Patent Slip.

The Graving-dock at Lyttelton, which is the property of the Harbour Board, is capable of docking men-of-war, or almost all of the large ocean steamers now running to the colony. Its general dimensions are: Length over all, 503ft.; length on floor, 450ft.; length inside caisson at a height of 4 ft. above the floor, 462 ft.; breadth over all, 82ft.; breadth on floor, 46ft.; breadth at entrance, 62ft.; breadth where ship's bilge would be, on 6ft. blocks, 55ft.; depth of water on sill at high-water springs, 23ft.

The scale of charges for the use of the dock and pumping machinery are as follow:—

	£	s.	d.
For all vessels up to 300 tons, for four days or less ..	20	0	0
" 301 to 400 tons, " ..	22	10	0
" 401 to 500 tons, " ..	25	0	0
" 501 to 600 tons, " ..	27	10	0
" 601 to 700 tons, " ..	30	0	0
" 701 to 800 tons, " ..	32	10	0
" 801 to 900 tons, " ..	35	0	0
" 901 to 1,000 tons, " ..	37	10	0
" 1,001 to 1,100 tons, " ..	40	0	0
" 1,101 to 1,200 tons, " ..	45	0	0
" 1,201 tons and upwards, " ..	50	0	0

After the fourth day in dock, the following rates are charged:—

For all vessels up to 500 tons	4d. per ton per day.
For all vessels of 501 tons to 1,000 tons ..	3d. "
For all vessels over 1,001 tons up to 2,000 tons ..	2¾d. "
" 2,001 tons up to 3,000 tons ..	2½d. "
" 3,001 tons up to 4,000 tons ..	2¼ "
" 4,001 tons up to 5,000 tons ..	2d. "

Twenty per cent. reduction on the above rates is allowed when two or three vessels can arrange to dock on the same tide and remain in dock the same number of hours. Two vessels of 1,000 tons each can be docked at the same time. The 20-per-cent. rebate is not allowed if any of the Lyttelton Harbour Board's vessels are docked at the same time as another vessel. The twenty-four hours constituting the first day of docking commences from the time of the dock being pumped out.

Any vessel belonging to H.M. Navy or any colonial Government, or any commissioned ship belonging to any foreign nation, is admitted into the graving dock without payment of the usual dock dues, but is charged only such sum as is necessary for the reimbursement of actual expenditure of stores, wages, and materials.

There are electric lights, one on each side of the graving-dock; and there is a workshop alongside the dock, and several other engineering works within a short distance of it, where repairs and heavy foundry-work can be undertaken.

The graving dock and machinery cost £105,000. The interest and sinking fund on that sum, at 6½ per cent., amounts to £6,825 per annum. Since its construction, the dock dues for

the twenty-one years, ended 31st December, 1903, amounted to £21,711 4s. 11d., and the working expenses to £13,041 5s. 4d., leaving a credit balance for twenty-one years, ended 31st December, 1903, of £8,669 19s. 7d.

During the year 1903 twenty-seven vessels were docked, and the dock dues amounted to £1,228 0s. 1d. For the twenty-one years, ending 1903, 429 vessels were docked, or an average of about twenty-one a year.

Patent Slip, Lyttelton.

Alongside the graving dock is a patent slip, with a cradle 150ft. in length, suitable for vessels of 300 tons. It belongs to the Harbour Board.

The following is the scale of charges:—

Up to 75 tons gross register, £4 for five days, and 10s. per day after the fifth day.
Over 75 tons and up to 150 tons gross register, £6 for five days, and 15s. per day after fifth day.
Over 150 tons and up to 250 tons gross register, £8 for five days, and 20s. per day after fifth day.
Over 250 tons gross register, £10 for five days, and 20s. per day after fifth day.
A day to mean between sunrise and sunset.
The above rates cover the cost of all labour connected with hauling up and launching (the crew of the vessel to give their assistance as may be required), and the cost of blocking a vessel and shifting the blocks after hauling up.

Otago Graving Dock.

The dock at Port Chalmers is vested in the Otago Dock Trust, a body entirely distinct from the Otago Harbour Board. Vessels of large size can be taken in the Otago Dock, as the following measurements will show:—

Length over all	335 feet.
Length on the floor	328 "
Breadth over all	68 "
Breadth on floor	41 "
Breadth where ship's bilge would be	43 "
Breadth at dock gates	50 "
Depth of water on sill at high-water (ordinary spring tides)	17½ "

Connected with the Otago Dock are a large machine-shop, steam-hammer, and forge, with all the appliances necessary for performing any work that may be required by vessels visiting the port. An 80-ton shear-legs has also been erected for heavy lifts.

There is also a patent slip, used for taking up small vessels.

All vessels using the Otago Graving Dock are liable to dock dues according to the following scale (unless under special contract), revised since the beginning of 1896:—

	£	s.	d.
Vessels under 200 tons, for the first three days, or part of three days	25	0	0
Vessels of 200 tons, and under 800 tons	35	0	0
" 800 tons and upwards	50	0	0

And for every day, or part of a day, after the first three days:—

Vessels under 300 tons				8d.	per register ton per day.
" 300 "	and under 400	tons		7¾d.	"
" 400 "	" 500	"		7½d.	"
" 500 "	" 600	"		7¼d.	"
" 600 "	" 700	"		7d.	"
" 700 "	" 800	"		6¾d.	"
" 800 "	" 900	"		6½d.	"
" 900 "	" 1,000	"		6¼d.	"
" 1,000 tons and upwards				6d.	"

During the twelve months ended 31st December, 1903, the dock was in use 214 working-days. The number of vessels docked was fifty-two, having a total registered tonnage of 46,212.

HARBOURS.

Pilotage, Port Charges, etc.

Pilotage, port charges, berthage charges, &c., at fourteen of the principal harbours in New Zealand, as on the 1st January, 1904 (compiled by Mr. C. Hood Williams, Secretary to the Lyttelton Harbour Board):—

Auckland.

Pilotage (not compulsory): Sailing-vessels, inwards and outwards, 3d. per ton each way.

Steamers, inwards and outwards, 2d. per ton each way when services of pilot are taken.

Pilotage includes the removal fee to or from the berth at 1d. per ton.

Port charges: 3d. per ton half-yearly (on all vessels over 15 tons) in one payment. Steamers arriving for coal, stores, water, or for receiving or landing mails or passengers and their luggage, which do not come to any wharf or receive or discharge cargo within the port, are exempt from port charges.

Harbourmaster's fees: 1d. per ton. Vessels paying pilotage are exempt.

Exemption berthage certificates are given to competent masters in the coastal and intercolonial trades, but not to those in foreign trade.

Berthage: Every person who shall use any wharf with any vessel shall pay for the use thereof—Ferry steamers, 10s. to £1 10s. per month; other vessels under 20 tons, 6d. and 1s. per day, not exceeding 10s. per quarter. For every vessel not included in the above, ¼d. per ton per day. Outside berths, ⅛d. per ton per day.

Gisborne.

Pilotage (not compulsory): Sailing-vessels over 100 tons, first 100 tons, 6d. per ton; every ton over 100 tons, 2d. per ton. Into and out of Turanganui River: Sailing-vessels, 3d. per ton; sailing-vessels towed, 2d. per ton; steamers, 2d. per ton.

Port charges: Vessels, intercolonial or foreign, 1d. per ton on arrival, not to exceed 3d. per ton in any three months; vessels, coastal, over 200 tons, 1d. per ton on arrival, not to exceed 3d. per ton in any three months; vessels, coastal, 200 tons and under, 3d. per ton on arrival, not to exceed 3d. per ton in any three months.

Harbourmaster's fees: Free.

Berthage alongside the wharves: Per day or part, under 50 tons, 5s.; over 50 tons and up to 75 tons, 7s. 6d.; over 75 tons up to 100 tons, 10s.; for every additional 50 tons or fraction thereof, 2s. 6d. Vessels discharging outside of bars to pay half foregoing dues. Steamers to pay double rates as per tonnage; and in all cases sailing-vessels to make way for steamers.

Napier.

Pilotage (not compulsory): Into Inner Harbour—Sailing-vessels, 4d. per ton; steamers, 3d. per ton. To roadstead—First 100 tons, sailing-vessels, 6d. per ton; steamers, 3d. per ton. Every ton over 100 tons—Sailing-vessels, 2d. per ton; steamers, 1d. per ton. Into Breakwater Harbour—First 100 tons, sailing vessels, 6d. per ton; steamers, 3d. per ton. Every ton over 100 tons—Sailing-vessels, 2d. per ton; steamers, 1d. per ton. Outward pilotage, half rates.

Port charges: 6d. per ton quarterly in advance, vessels plying within port; 2d. per ton on arrival of vessels not plying within port, but not to exceed 1s. per ton in any half-year. Ocean-going vessels (not being "colonial trading" or coasting vessels) returning to port within one month from date of first arrival are exempt from port charges for second or subsequent arrivals within one calendar month.

Harbourmaster's fees: 5s. per vessel of less than 60 tons. Steamers under 60 tons and licensed as lighters are exempt. 1d. per ton sailing-vessels 60 tons and upwards; 10s. per vessel steamers of 60 tons and under 120 tons; 1d. per ton steamers of 120 tons and upwards. Vessels paying for pilotage service inwards do not pay Harbourmaster's fees.

Berthage: Breakwater Harbour wharves—3d. per ton on cargo landed, shipped, or transhipped; 1s. each horse or large cattle shipped or transhipped; ½d. each sheep or small animal shipped or transhipped. Other wharves—10s. per vessel of 60 tons; £1 per vessel over 60 tons to 120 tons; 2d. per ton vessels over 120 tons. Half rates only charged where vessels entering the Inner Harbour pay for pilotage services. Vessels licensed as lighters or tow-boats shall, whilst actually employed at lighterage work, only pay one-third of the foregoing charges upon each and every trip.

Hawsers and moorings: Vessels at wharf in Breakwater Harbour—¼d. per ton per day, or part of a day, on registered tonnage. Vessels moored to buoys within Breakwater Harbour, ⅛d. per ton per day or part of a day.

Fenders: Vessels at wharves in Breakwater Harbour—5s. per day, vessels under 500 tons; 7s. per day, vessels of 500 tons and under 1,000 tons; 10s. per day vessels of 1,000 tons and under 1,500 tons; 15s. per day, vessels of 1,500 tons and under 2,000 tons; £1 per day, vessels of 2,000 tons; and so on, in proportion.

New Plymouth.

Pilotage (compulsory): Charged both inwards and outwards, intercolonial or coasting—Sailing vessels, 3d. per ton; steamers, 1½d. per ton; foreign sailing-vessel or steamer, ½d. per ton.

Port charges: Intercolonial, 4d. per ton, payable half-yearly; foreign, ½d. per ton on arrival in roadstead.

Harbourmaster's fees: Free.

Berthage rate: 3½d. per ton on all cargo landed, shipped, or transhipped outwards; on registered tonnage also ½d. per ton.

Warps: 1d. per ton register for first 100 tons; ½d. per ton for excess.

Fenders: 1s. per day or part of day.

Water (minimum 3s.): 5s. per 1,000 gallons.

Wanganui.

Pilotage: All vessels when piloted by signals from the staff only, 1d. per ton register. River pilotage, to be charged for any assistance rendered by the pilot or any of his crew inside the bar, 2d. per ton. When a pilot boards and conducts a vessel outside the bar, 3d. per ton. Steamers engaged in tendering ocean steamers at anchor in the roadstead charged half pilotage rates.

Port charges: Nil.

Harbourmaster's fees: Free.

Berthage: For every steamer using any wharf, being berthed alongside, and whether discharging or loading cargo or not, 2d. per ton on gross register for first day of eight working hours, and 1d. for every succeeding day of eight

working hours. For every sailing-vessel the charge to be 2d. for first day of eight working hours, and ½d. for every succeeding day of eight working hours, not exceeding five days. For every vessel occupying a berth outside another vessel, and loading or discharging cargo, ¼d. per ton on gross register per day of eight working hours whilst loading or discharging. Ships' dues on vessels detained in port by stress of weather will not be charged after the third day.

Wellington.

Pilotage (optional): Sailing-vessels inwards, 4d. per ton; sailing-vessels outwards, 3d. per ton; steamers inwards, 3d. per ton; steamers outwards, 2d. per ton. Pilotage includes the removal fee to or from the berth at 1d. per ton.

Port charges: 2d. per ton on arrival; not exceeding 6d. in any half-year. Half-yearly days, 1st January and July. Steamers arriving for coal, stores, water, or for receiving or landing mails or passengers and their luggage, which do not come to any wharf or receive or discharge cargo within the port, are exempt from port charges.

Harbourmaster's or berthing fee on vessels of 120 tons and upwards, 1d. per ton; under 120 tons, 10s. Vessels paying pilotage are exempt. Exemption berthage certificates are given to competent masters in the coastal and inter-colonial trades, but not to those in foreign trade.

Berthage: None, unless vessels delay discharging or loading for an undue time.

Nelson.

Pilotage (compulsory): Steamers, inwards and outwards, 1d. per registered ton. Sailing-vessels, inwards and outwards, 3d. per ton. Minimum pilotage each way (in all cases), £1.

Port charges: For vessels not employing the pilot, to pay the following, upon first arrival, half-yearly: Vessels over 100 tons register, 1s. per ton; vessels under 100 tons register, 6d. per ton.

Harbour lights: Vessels not employing the pilot, over 100 tons register, 1d. per ton; under 100 tons register, ½d. per ton, on arrival.

Harbourmaster's fees: 120 tons and upwards, 1d. per ton; less than 120 tons, 10s. for each removal of any steamer or sailing vessel within the harbour.

Berthage, fenders, and warps: Nil.

Westport.

Pilotage (not compulsory). Signal station. Four pilots authorised: Vessels up to 120 tons register, 1d. per ton; over 120 tons, 2d. per ton inwards and outwards; minimum charge, 5s.; maximum charge, £10.

Port charges: Receiving and discharging ships' ballast, 1s. per ton; minimum charge, 20s.; 1d. per ton for use of shoot.

Harbourmaster's fees: Free.

Berthage: Use of wharf, for every vessel up to 1,400 tons lying at wharf, 1d. per ton net register per trip; for every vessel over 1,400 tons, 2d. per ton net register per trip; minimum charge, 5s. No vessel to be charged for more than one trip in any one week.

Greymouth.

Pilotage (not compulsory): Signal-station. For sailing vessels, 6d. per ton; for steamers, 4d. per ton, each way.

Port charges: Discharging ships' ballast, 6d. per ton

Harbourmaster's fees: Free.

Berthage: Use of wharf, 6d. per ton net register per trip. Vessels in ballast for coal or timber, 1d. per ton net register for the first four days; maximum, £5 10s.; minimum, 5s.

Lyttelton.

Pilotage (compulsory): Pilotage, inwards and outwards, sailing-vessels 3½d. per ton; steamers, 2½d. per ton. Foreign going steamers and sailing vessels free on second call on same voyage.

Port charges: 2d. per ton, quarterly in advance, for vessels of 100 tons and upwards plying within the port or employed in coasting only, not to exceed 6d. per ton in any half-year; 2d. per ton for vessels of 100 tons and upwards not plying within the port or not solely employed in coasting, not to exceed 6d. per ton in any half-year. For exemptions from pilotage and harbour fees, see sections 132, 133, and 134 of "The Harbours Act, 1878."
Harbourmaster's fees: Free.
Berthing charges: None.
Warps (21 in. coir hawsers): £1 per warp for use during a vessel's stay in port, not exceeding six months.
Fenders (soft wood): 10s. for first day, and 5s. per day after. 10s. for use of each hardwood fender.

TIMARU.

Pilotage (compulsory): Sailing-vessels, 3d. per ton inwards and outwards; when tug used, 2d. per ton; steamers, 2d. per ton inwards and outwards. Foreign and intercolonial steamers under 3,500 cargo tons, working 800 tons or less, only one pilotage fee; 3,500 tons or over, working 1,000 tons cargo or less, one pilotage fee only. Foreign going steamer and sailing-vessel calling more than once during same voyage before leaving New Zealand, one inward and outward rate only (subject to above exemptions).
Port charges: Coasters, 1½d. per ton each trip; sailing-vessels, not coasters, 3d. per ton each trip; steam-vessels, not coasters, 6d. per ton on cargo worked; in all cases not to exceed 1s. 3d. per ton in any half-year, dating from the 1st day of January and July in each year. Intercolonial steamers coming coastwise 1½d. per ton register, or 6d. per ton on cargo landed and shipped, whichever rate may be the lesser.
Harbourmaster's fees: 1d. per ton each service; vessels less than 120 tons, 10s.; steamers of 1,000 tons or over, which have loaded wholly in New Zealand or Australian ports, working 500 tons of cargo or less, only one harbourmaster's fee. This fee is charged to all vessels or steamers not paying pilotage.
Berthage: 3d. per ton on all cargo landed or shipped.
Hawsers and moorings: Vessels at wharves, ½d. per ton register for first seven days; subsequent days, ¼d. per ton. Vessels at buoys, under 800 tons register, ⅛d. per ton; over 800 tons, $\frac{1}{16}$d. per ton.
Fenders: Sailing-vessels under 500 tons register, 2s. per day; under 1,000 tons, 3s. per day; over 1,000 tons, 4s. per day. Steamers under 1,000 tons register, 4s. per day; under 1,500 tons, 10s. per day; under 2,000 tons, 15s. per day; over 2,000 tons, £1 per day. Foreign-going vessels detained in the port sixty days, half rates thereafter for hawsers and moorings and fenders.

OAMARU.

Tonnage rate: On cargo, inwards or outwards—Coal, merchandise, stone, produce, and timber, 8d. per ton; wool, 2s. per ton; frozen sheep, 1d. per carcase; frozen lamb, 1d. per carcase; rabbits and hares, 3s. per ton, gross weight; all other frozen goods 3s. per ton, gross dead weight; live stock, 1s. 8d. per ton. Note.—Collected in the same manner as berthage dues have been collected.
Warps: ½d. per ton per day for seven days; ¼d. per ton per day thereafter. In the event of any vessel remaining at any wharf for a period exceeding six weeks, the charge for warps will thereafter be reduced to ⅛d. per ton register of such vessel for each day or part of a day that she may occupy a berth at the wharf.

OTAGO.

Pilotage (compulsory): Inwards and outwards, sailing-vesssls without tug, 6d. per ton; with tug, 4d. per ton; steamers, 4d. per ton. Foreign steamers calling twice on one voyage only charged once. All vessels holding exemption certificates, one annual pilotage. For every vessel under steam carrying an exempt pilot and employing a Board's pilot the charge shall be ½d. per ton for the Upper Harbour.
Port charges: 6d. per ton half-yearly, all vessels.

Harbourmaster's fees: Vessels less than 120 tons, 10s.; over 120 tons, 1d. per ton.

Berthage: Vessels trading within the port—10 tons, 5s. per quarter; 25 tons, 10s. per quarter; 50 tons, 15s. per quarter; 100 tons, £1 per quarter. Vessels trading beyond the port—Sailing-vessels ¼d. per ton (maximum, eighteen days, £10); steam-vessels, ½d. per ton per day. Vessels laid up for less than a month, one-half the above rates; over a month, ½d. per ton per month.

Towage: When assistance is given to steam-vessels under steam, one-fourth usual towage, not exceeding £5 for Upper Harbour, and £7 for Lower Harbour.

Note.—Foreign steamers taking or discharging not more than 50 tons general cargo and 100 tons frozen produce, pay £50 for port charges, pilotage, and harbourmaster's fees; also maximum charges on any one vessel, £200.

Bluff.

Pilotage (compulsory): Steamers, inwards and outwards, 2½d. per registered ton; sailing-vessels, 4½d. inwards and outwards if tug not employed; 2½d. per registered ton inwards and outwards if tug employed. Sailing-vessels in ballast, 2½d. per registered ton inwards and outwards. Steamers in and out, 5d. per registered ton, payable yearly; sailing-vessels, in and out, 9d. per registered ton, payable yearly.

Port charges: On all vessels, per trip, 2d. per registered ton, or in one sum, half-yearly from date of entry, 6d. per registered ton.

Harbourmaster's fees: Free.

Berthage: Steamers, 2d. per ton net register for the first day, and 1d. per ton per week or part of a week thereafter. Sailing-vessels and hulks of over 50 tons register, 1d. per ton net register per week for the first four weeks, and ½d. per ton per week thereafter.

Towage assistance to steamers using their own motive power: Over 3,000 tons, £5; over 2,000 tons, £4; under 2,000 tons, £3.

Maximum charge for berthage dues, pilotage, and port charges, £180 in any one visit.

Steamers calling more than once on same voyage only charged one inward and outward pilotage.

Wharfage Rates.

Wharfage rates at fourteen of the principal harbours in New Zealand, as on 1st January, 1904 (compiled by Mr. C. Hood Williams, Secretary to the Lyttelton Harbour Board):—

Auckland.

General Merchandise.—2s. per ton imports; 1s. per ton exports.
Transhipments: Half-rates when declared before landing, or 2s. 6d. per ton, including labour and seven days' storage.

Grain and Agricultural Produce.—1s. 6d. per ton landed; 1s. per ton shipped.
Transhipments: Half-rates when declared before landing, or 2s. 6d. per ton, including labour and seven days' storage.

Frozen Meat, Butter, &c.—1s. 6d. per ton landed; 1s. per ton shipped.
Transhipments: Half-rates when declared, or 2s. 6d. per ton, including seven days' storage and labour.

Wool.—6d. per bale, shipped or landed.
Transhipments: If landed, dumped, and re-shipped, 3d. per bale.

Coal.—1s. 3d. per ton landed; 6d. per ton shipped.
Transhipments: Shipped or discharged over side for steamer's use, free.

Timber.—Sawn, 2s. per 1,000 ft. landed; 1s. per 1,000 ft. shipped. Baulk or round (less 12½ per cent.), 1s. per 1,000 ft. landed, 6d. per 1,000 ft. shipped.

Passengers' luggage under half ton, goods carried by hand by passengers, and single packages under 5 ft. measurement, free.

Gisborne.

General Merchandise.—Imports, 5s. to 6d.; exports, 2s. 6d. to 6d. By measurement, from 40 cubic feet to 4 cubic feet; same for weight. Ale, beer, and porter, per gallon—Import, 1½d., export, ½d.; spirits and wine, per ton measurement, 7s. 6d. No export charges on goods that have paid inward wharfage.

Transhipments: Free.

Grain and Agricultural Produce.—Grain—Imports, 5s.; exports, 1s. Grass-seed—Imports, 5s.; exports, 2s. Potatoes—Imports, 5s.; exports, 2s. 6d. (12 sacks).

Transhipments: Free.

Frozen Meat, Butter, &c.—Sheep, 2d. per carcase; lambs, 1d. per carcase; haunches. legs, &c., 2s. 6d. per ton.

Transhipments: Free.

Wool.—1s. 3d. per bale, export.

Transhipments: 3d. per bale if landed and reshipped. Free if transhipped into vessel.

Coal.—2s. per ton.

Transhipments: Coal for engines and freezing-ships, free.

Timber.—Sawn, 4s. per 1,000 ft.; baulk, 1s. per 1,000 ft., imports; 1s., and 6d., per 1,000 ft., exports.

Transhipments: Free.

Napier.

General Merchandise.—2s. per ton imports, 1s. per ton exports, according to measurement or weight. If labour supplied, add on 6d. imports, and 6d. exports. Ballast, inwards, 1s. per ton; outwards, 1s. per ton. Empties, half rates.

Transhipments: Quarter import rates, Outer Harbour; half import rates, Inner or Breakwater Harbours.

Grain and Agricultural Produce.—2s. imports; 1s. exports, according to measurement or weight. If labour supplied, add on 6d. imports, and 6d. exports.

Transhipments: Quarter import rates, Outer Harbour; half import rates, Inner or Breakwater Harbours.

Frozen or Chilled Meat, &c.—Imports free; exports 1s. per ton. Tallow and pelts, imports free; exports 2s. 6d. per ton.

Transhipments: Quarter import rates, Outer Harbour; half import rates Inner or Breakwater Harbours.

Wool.—6d. per bale, exports only. Imports, free.

Transhipments: Wool, flax, skins, or tow, 3d. over side; 3d. per bale if landed for transhipment or dumping.

Coal.—1s. imports; 1s. exports.

Transhipments: Quarter rates, Outer Harbour; half rates, Inner or Breakwater Harbours. Coal for engines and freezing-ships, Outer Harbour, free, if declared so.

Timber.—3s. 4d. per 1,000 ft., imports; 1s. 3d. per 1,000 ft. exports.

Transhipments: Half rates, Inner or Breakwater Harbours; quarter rates, Outer Harbour.

Note.—Goods other than wool, skins, tow, meats, and flax landed on a wharf for transhipment to a vessel lying at another berth, charged inward wharfage only when declared at time of entry.

New Plymouth.

General Merchandise.—2s. per ton.

Transhipments: 1s. 6d. per ton.

Grain and Agricultural Produce.—2s. per ton; grass-seed, 2s. (20 sacks).

Transhipments: 1s. 6d. per ton.

Frozen Meat, Butter, &c.—2s. per ton.

Transhipments: 1s. 6d. per ton.

Wool.—6d. per bale; five bales of 4 cwt., 2s. per ton; three bales of over 4 cwt. 2s. per ton.
Transhipments: Three-quarter rates.
Coal.—2s. per ton; brown coal, 1s. 9d., with labour.
Transhipments: Three-quarter rates, with labour.
Timber.—480 ft. per ton, 2s.; hardwood, 320 ft. per ton (rough or sawn), 2s., with labour.
Transhipments: Three-quarter rates.

WANGANUI.

General Merchandise.—Imports, 3s. per ton; exports, 2s. per ton.
Transhipments: Half-rates.
Grain and Agricultural Produce.—Imports, 3s. per ton; exports, 2s. per ton. Potatoes, export, 1s. per ton.
Transhipments: Half-rates.
Frozen Meat, Butter, &c.—Sheep, ½d. per carcase; lambs, ½d. per carcase; legs, shoulders, and loins calculated at so many to a carcase, according to freight.
Wool.—6d. per bale.
Transhipments: Half rates.
Coal.—1s. per ton. Coal for ship's use, outward, 6d. per ton.
Transhipments: Half-rates.
Timber.—6d. per 100 ft.; for shipment, 2d.; white pine, 1d.
Transhipments: Half rates.

WELLINGTON.

General Merchandise.—2s per ton inwards, including labour and one night's storage. Inward cargo landed after noon on Friday is stored free till noon on following Monday; landed after noon on Saturday is stored free till 5 p.m. on the following Tuesday. 1s. per ton outwards, including labour. Railway wharfage—1s. inwards; 6d. outwards, without labour.
Transhipments: 2s. 6d. per ton, including labour and one week's storage. Over side of vessel lying at wharf, 6d. per ton. If shifted more than a quarter of a mile, 6d. per ton extra.
Grain and Agricultural Produce.—2s. per ton inwards, including labour and one night's storage; 1s. per ton outwards, including labour. Railway wharfage—1s. inwards; 6d. outwards, without labour.
Transhipments: 2s. per ton, including labour and seven days' storage. Over side of vessel at wharf, 6d. per ton.
Frozen Meat, Butter, &c.—1s. inwards; 1s. outwards, without labour. Railway wharfage—1s. inwards; 6d. outwards, without labour.
Transhipments: Meat, 1s. 3d. per ton, without labour; butter, 2s. 6d. per ton, including labour and storage. Meat, butter, &c., over side of vessel at wharf, 6d. per ton.
Wool.—4d. per bale at Railway Wharf, without labour; 6d. per bale at other wharves, including labour.
Transhipments: 6d. per bale, including labour, and 3d. additional if stored. Over side of vessel to vessel at wharf, 3d. per bale.
Coal.—1s. per ton imports; 6d. per ton exports, without labour. Railway wharfage—1s. per ton inwards; 6d. per ton outwards, without labour.
Transhipments: Across wharf for steamer's use, free. From vessel or hulk to vessel at wharf, free. If shifted more than a quarter of a mile, 6d. per ton extra.
Timber.—2d. per 100 ft. inwards; 1½d. per 100 ft. outwards, without labour. If labour supplied, 2d. per 100 ft. added inwards, and 1½d. outwards. Railway wharfage—2d. inwards; 1½d. outwards, without labour.
Transhipments: 2s. 6d. per ton, including seven days' storage and labour; and 6d. over vessel's side into another vessel at wharf.
Harbour Improvement Rate.—The charge of 3d. per ton shall be made to and payable by ships to the Board, as a harbour improvement rate on

goods landed on the wharves or landing-places under the control of the Board, except on coal and on ballast, and except on such goods as are the products of the Colony of New Zealand and are landed for the purpose of transhipment to vessels to be carried out of the colony: Provided that for the purposes of this by-law the following measurements shall be taken: Empties, half tonnage; wool, five bales to the ton; great cattle, each one ton; small cattle, twelve to the ton; timber, 500 ft. superficial measurement to the ton; bricks, slates, and tiles, 500 to the ton; carts and carriages, each two tons; loose hides, twenty-five to the ton.

Nelson.

General Merchandise.—2s. per ton, imports and exports, with labour.
Transhipments: Free, when not landed on wharf; 2s. 6d. if landed.
Grain and Agricultural Produce.—1s. 6d. per ton, imports and exports, with labour.
Transhipments: Free, when not landed on wharf; 2s. 6d. if landed.
Frozen Meat, Butter, &c.—None shipped.
Transhipments: Free, when not landed on wharf; half rates if landed.
Wool.—Exports, 1s. per bale; imports free.
Transhipments: Free, when not landed on wharf; half rates if landed.
Coal.—1s. per ton imports; 2s. with labour. Free exports.
Transhipments: 2s. 6d. per ton, with labour. Free, when not landed on wharf.
Timber.—1d. per 100 ft. super., import; 1d. per 100 ft. super., export; 2s. per ton by measurement, with labour.
Transhipments: Free, when not landed on wharf; half rates if landed on wharf. Re-shipments, 2s. 6d. per ton.

Westport.

General Merchandise.—2s. per ton.
Transhipments: 2s. 6d. per ton, including labour and one week's storage; 1s. per ton if transhipped to vessel or lighter.
Grain and Agricultural Produce.—2s. per ton.
Transhipments: 2s. 6d. per ton, including labour and one week's storage; 1s. per ton if transhipped to vessel or lighter.
Frozen Meat, Butter, &c.—2s. per ton.
Transhipments: 2s. 6d. per ton, including labour and one week's storage.
Wool.—6d. per bale.
Transhipments: 2s. 6d. per ton, including labour and one week's storage; 1s. per ton if transhipped to vessel or lighter.
Coal.—6d. per ton.
Timber.—2d. per 100 ft. If for export and carried by rail, free.

Greymouth.

General Merchandise.—3s. per ton. This charge includes 1s. a ton for receiving and delivering.
Transhipments; 2s. 6d. per ton, including labour and one week's storage; 1s. per ton if transhipped to vessel or lighter.
Grain and Agricultural Produce.—3s. per ton. This charge includes 1s. a ton for receiving and delivering.
Transhipments: 2s. 6d. per ton, including labour and one week's storage; 1s. per ton if transhipped to vessel or lighter.
Frozen Meat, Butter, &c.—3s. per ton. This charge includes 1s. a ton for receiving and delivering.
Transhipments: 2s. 6d. per ton, including labour and one week's storage.
Wool.—6d. per bale.
Transhipments: 2s. 6d. per ton, including labour and one week's storage; 1s. per ton if transhipped to vessel or lighter.
Coal.—6d. per ton inwards; 3d. outwards. Special rate on coal paid by shippers.
Timber.—2d. per 100 ft. If for export and carried by rail, free.

LYTTELTON.

General Merchandise.—1s. 6d. per ton.
Transhipments: Free, whether landed on wharf or otherwise.
Grain and Agricultural Produce.—6d. per ton.
Transhipments: Free.
Frozen Meat, Butter, &c.—6d. per ton.
Transhipments: Free, whether landed on wharf or otherwise.
Wool.—6d. per bale.
Transhipments: Free.
Coal.—6d. per ton.
Transhipments: Free, whether landed on wharf or otherwise.
Timber.—3d. per 100 ft.
Transhipments: Free.
N.B.—All re shipments of goods from Lyttelton under declaration, free.

TIMARU.

General Merchandise.—2s. per ton.
Transhipments: Half rates.
Grain and Agricultural Produce.—1s. 6d. per ton.
Transhipments: Half rates.
Frozen Meat.—½d. per carcase.
Transhipments: Half rates.
Wool.—1s. per bale.
Transhipments: Half rates.
Coal.—2s. per ton.
Transhipments: Half rates. For bunkering purposes, free.
Timber.—4d. per 100 ft.
Transhipments: Half rates.

OAMARU.

General Merchandise.—2s. per ton.
Transhipments: Free.
Grain and Agricultural Produce.—2s. per ton.
Transhipments: Free.
Frozen Meat, Butter, &c.—½d. per sheep. Butter, as merchandise, 2s. per ton. Other frozen goods, 2s. per ton
Transhipments: Free.
Wool.—6d. per bale.
Transhipments: Free.
Coal.—2s. per ton.
Transhipments: Free.
Timber.—5d. and 7d. per 100 ft. Fencing posts and rails, 4s. per 100. Palings, 7d. per 100.
Transhipments: Free.
Stone.—½d. per foot.
Live Cattle and Horses.—2s. 6d. each; yearlings, half rates. Sheep, 2d. each; pigs, 4d. each.

DUNEDIN.

General Merchandise.—1s., 2s., 3s., 4s., and 5s. per ton, imports; 2s. and 3s. per ton, exports. (Classified.) Manufactured articles and articles which have paid an import duty, free.
Transhipments: 2s. per ton, or 1s. if import rate is 1s.
Grain and Agricultural Produce.—1s. per ton, imports; 1s. 3d. per ton by weight, exports; bran and pollard, exports, free.
Transhipments: 1s. per ton.
Frozen Meat, Butter, &c.—3s. per ton, exports; butter, imports, 4s. per ton; frozen meat, imports, 5s. per ton; sheep and lambs, 1d. per carcase, exports.
Transhipments: 2s. per ton.
Wool.—Exports, 3s. per ton by measurement; 4s. per ton, imports (three bales to ton).
Transhipments: 2s. per ton by measurement.

Coal.—3s. per ton, imports: Exports free.
Transhipments: 2s. per ton.
Timber.—6d. and 3d. per 100 superficial feet, imports; exports, free.
Transhipments: 2s. per ton by measurement. Notice of transhipment must be given within twenty-four hours after ship's arrival.

BLUFF.

General Merchandise.—1s. 10d. per ton, imports and exports.
Transhipments: Free, when not landed on wharf; half rates if landed.
Grain and Agricultural Produce.—11d. per ton, imports and exports.
Transhipments: Free, when not landed on wharf; half rates if landed.
Frozen Meat, Butter, &c.—11d. per ton, exports; cheese, 1s. per ton.
Transhipments: Free, when not landed on wharf; half rates if landed.
Wool.—Exports, 9d. per bale; imports free.
Transhipments: Free, when not landed on wharf; half rates if landed.
Coal.—1s. 6d. per ton, imports; free exports.
Transhipments: 1s. 6d. per ton when landed ex hulk; free when not landed on wharf.
Timber.—1s. per 1,000 ft. super., import; 1s. per 1,000 ft. super., export.
Transhipments: Free, when not landed on wharf; half rates if landed on wharf.

LIGHTHOUSES.

THE coasts of New Zealand are, considering their extent, fairly well lighted, but there are many places where lights are still required. Additions to the existing lights are made from time to time as funds are available.

There are thirty coastal lights—eight of the first order, sixteen of the second, three of the third, and three of smaller orders, and a lighthouse is being erected on Jack's Point, near Timaru.

There has been no special difficulty in the erection of lighthouses in New Zealand, apart from the trouble caused by indifferent landings. There are no lighthouses built in the sea, such as the well-known Eddystone or Bell Rock. That on The Brothers is the only one which it is considered necessary to keep as a rock-station: that is, the keepers are relieved from time to time, three being always at the station and one on shore.

The cost of the erection of the lighthouses is given by the Marine Department as about £190,700 (the Ponui Passage Lighthouse, having been built by the Provincial Government of Auckland, the cost is not given). The annual consumption of oil is about 22,700 gallons; and the cost of maintenance, irrespective of the cost of maintaining the lighthouse steamer, is about £16,000 a year.

Besides the coastal lighthouses, there are harbour-lights at most of the ports of the colony for the guidance of vessels into and out of the ports.

The following table shows the names of the coastal lighthouses, indicating also their situation, the order of apparatus, description, period (in seconds) and colour of the lights, and of what material the respective towers are built:—

Name of Light-house.	Order of Apparatus.	Description.	Period of Revolving Light.	Colour of Light.	Tower built of.
	Dioptric.		Seconds.		
Cape Maria van Diemen	1st order ..	Revolving	60	White	Timber.
	..	Fixed ..	..	Red, to show over Columbia Reef	
Moko Hinou ..	1st „ ..	Flashing	10	White	Stone.
Tiri-Tiri (Auckland)	2nd „ ..	Fixed ..	..	White, with red arc over Flat Rock	Iron.
Ponui Passage..	5th „ ..	„ ..	..	White and red ..	Timber.
Cuvier Island ..	1st „ ..	Revolving	30	White	Iron.
East Cape ..	2nd „ ..	„	10	„	„
Portland Island	2nd „ ..	„	30	„ ..	Timber.
	..	Fixed ..	..	Red, to show over Bull Rock	
Cape Palliser ..	2nd „ ..	Flashing	Twice every half-minute, with three seconds intervals between flashes	White	Iron.
Pencarrow Head	2nd „ ..	Fixed ..	..	White	Iron.
Cape Egmont ..	2nd „ ..	„ ..	..	„	„
Manukau Head	3rd „ ..	„ ..	..	„	Timber.
Kaipara Head ..	2nd „ ..	Flashing	10	„	„
Brothers (in Cook Strait)	2nd „ ..	„	10	„ ..	„
	..	Fixed ..	..	Red, to show over Cook Rock	
Cape Campbell	2nd „ ..	Revolving	60	White	„
Godley Head (Lyttelton)	2nd „ ..	Fixed ..	..	„	Stone.
Akaroa Head ..	2nd „ ..	Flashing	10	„	Timber.
Moeraki ..	3rd „ ..	Fixed ..	..	„	„
Taiaroa Head ..	3rd „ ..	„ ..	..	Red	Stone.
Cape Saunders..	2nd „ ..	Revolving	60	White	Timber.
Nugget Point ..	1st „ ..	Fixed ..	..	„	Stone.
Waipapapa Point	2nd „ ..	Flashing	10	„	Timber.
	Catadioptric.				
Dog Island ..	1st order ..	Revolving	30	„	Stone.
	Dioptric.				
Centre Island ..	1st order ..	Fixed ..	..	White, with red arcs over inshore dangers	Timber.
Puysegur Point	1st „ ..	Flashing	10	White	„
Cape Foulwind	2nd „ ..	Revolving	30	„	„
Kahurangi Point	2nd „ ..	Fixed ..	..	„	Iron.
Farewell Spit ..	2nd „ ..	Revolving	60	White, with red arc over Spit end	„
Nelson ..	4th „ ..	Fixed ..	..	White, with red arc to mark limit of anchorage	„
French Pass ..	6th „ ..	„ ..	..	Red and white, with white light on beacon	„
Stephens Island	1st „	Group flashing	30	White	„

NEW ZEALAND NEWSPAPERS.

THERE are (January, 1904) 200 publications on the register of newspapers for New Zealand. Of these, sixty are daily papers, twenty-six are published three times a week, twenty-six twice a week, fifty-seven once a week, four fortnightly, one three-weekly, and twenty-six monthly.

The names of the newspapers, with the postal districts and towns in which they are printed, are given in the following list, the second column showing the day or period of publication.

M. signifies morning paper; E. evening paper:—

AUCKLAND.

Auckland—	
Auckland Star (E.)	Daily.
Auckland Weekly News and Town and Country Journal (M)	Saturday
Bible Standard (M.)	Monthly.
Christian Worker (M.)	"
Church Gazette (M.)	"
New Zealand Farmer, Bee and Poultry Journal (M.)	"
New Zealand Graphic, Ladies' Journal, and Youths' Companion (M.)	Wednesday.
New Zealand Herald (M.)	Daily.
New Zealand Illustrated Magazine (M.)	Monthly.
New Zealand Illustrated Sporting Review and Licensed Victualler's Gazette (M.)	Thursday.
New Zealand Joyful News (M.)	Monthly.
Observer (M.)	Saturday.
Saturday Night (E.)	"
Sharland's Trade Journal (M.)	"
Coromandel—	
Coromandel County News and Kuaotunu and Mercury Bay Mail (E).	Tuesday, Friday.
Dargaville—	
Wairoa Bell and Northern Advertiser (E.)	" "
Hamilton—	
Waikato Argus (E.)	Daily.
Waikato Times and Thames Valley Gazette (E.)	"
Kawakawa—	
Northern Luminary (E.)	Friday.
Kawhia—	
Kawhia Settler and Raglan Advertiser (M.)	Saturday.
Onehunga—	
Manukau and Franklin Mail and Auckland Courier (E.)	Friday.
Manukau County Chronicle (M.)	Saturday.
Raglan—	
Raglan County Chronicle (M.)	Friday.
Rotorua—	
Hot Lakes Chronicle (M.)	Wed., Saturday.
Warkworth—	
Rodney and Otamatea Times, Waitemata and Kaipara Gazette (E.)	Friday.
Whangarei—	
Northern Advocate (E.)	Daily.

THAMES.

Karangahake—	
Goldfields Advocate and Ohinemuri County Chronicle (M.)	Tues., Thur., Sat

Opotiki—
East Coast Guardian (E.) .. .. .. Wed., Saturday.
Opotiki Herald, Whakatane County and East Coast Gazette (E.) .. .. Tuesday, Friday.
Paeroa—
Ohinemuri Gazette (E.) .. .. .. Mon., Wed., Fri.
Tauranga—
Bay of Plenty Times and Thames Valley Warden (E.) .. Mon., Wed., Fri.
Te Aroha—
Te Aroha and Ohinemuri News and Upper Thames Advocate (M.) .. .. Tues., Thur., Sat.
Thames—
Thames Advertiser and Miners' News (M.) .. .. Daily.
Thames Star (E.) .. .. "
Waihi—
Waihi Daily Telegraph (E.) .. .. .. Daily.

GISBORNE.

Gisborne—
Gisborne Times (M.) .. .. Daily.
Poverty Bay Herald (E.) .. .. .. "

NEW PLYMOUTH.

Inglewood—
Inglewood Record and Waitara Age (E.) .. .. Mon., Wed., Fri.
New Plymouth—
Budget and Taranaki Weekly Herald (M.) .. .. Saturday.
Daily News (M.) .. .. Daily.
Taranaki Herald (E.) .. .. "
Taranaki News (M.) .. .. Saturday.
Opunake—
Opunake Times (E.) .. .. Tuesday, Friday.
Stratford—
Stratford Evening Post (E.) .. .. .. Daily.
Waitara—
Waitara Evening Mail and Clifton County Chronicle (E.) Mon., Wed., Fri.

NAPIER.

Dannevirke—
Dannevirke Advocate (E.) .. .. .. Daily.
Dannevirke Daily Press (E.) .. .. .. "
Hastings—
Hastings Standard (E.) .. .. "
Napier—
Daily Telegraph (E.) .. .. "
Hawke's Bay Herald (M.) .. .. .. "
New Zealand Fire and Ambulance Record (M.) .. Monthly.
New Zealand Health Journal (M.) .. .. "
Waipawa—
Waipawa Mail (E.) .. .. Tues., Thur., Sat.
Wairoa—
Wairoa Guardian and County Advocate (M.) .. .. Tuesday, Friday.

WANGANUI.

Eltham—
Eltham Argus and Rawhitiroa and Kaponga Advertiser (E.) Daily.
Hawera—
Egmont Star (M.) .. .. Saturday.
Hawera and Normanby Star, Patea County Chronicle, and Waimate Plains Gazette (E.) .. .. Daily.
Hunterville—
Hunterville Express, and Upper Rangitikei Advertiser (E.) Tues., Thur., Sat.
Manaia—
Waimate Witness (E.) .. .. Mon., Wed., Fri.

Mangaweka—
Settler (E.) .. .. Wed., Saturday.
Marton—
Farmers' Advocate (M.) .. .. .. Saturday.
Rangitikei Advocate and Manawatu Argus (E.) .. Daily.
Patea—
Patea County Press (E.) .. .. .. Mon., Wed., Fri.
Taihape—
Post (M.) .. .. Thursday.
Taihape and Mangaweka News (E.) .. .. Tues., Thur., Sat.
Wanganui—
New Zealand Good Templar Watchword (M.) .. .. Monthly.
New Zealand Tit Bits (M.) .. .. .. Saturday.
Wanganui Chronicle (M.) .. .. .. Daily.
Wanganui Herald (E.) .. .. "
Weekly Chronicle and Patea-Rangitikei Advertiser (M.) .. Saturday.
Yeoman (M.) .. .. Friday.

WELLINGTON.

Carterton—
Wairarapa Leader (E.) .. .. Mon., Wed., Fri.
Wairarapa Observer, Featherston Chronicle, East Coast Advertiser, and South County Gazette (E.) .. Daily.
Eketahuna—
Eketahuna Express and County Gazette (E.) .. Tues., Thur., Sat.
Feilding—
Feilding Star (E.) .. .. Daily.
Foxton—
Manawatu Herald (E.) .. .. Tues., Thur., Sat.
Greytown North—
Te Puke ki Hikurangi (E.) .. .. .. Tues., fortnightly.
Wairarapa Standard and Featherston Advocate (E.) .. Mon., Wed., Fri.
Kimbolton—
Kimbolton Times and County News (E.) .. .. " " "
Levin—
Manawatu Farmer and Horowhenua County Chronicle (E.) " " "
Masterton—
Wairarapa Age (M.) .. .. Daily.
Wairarapa Daily Times (E.) .. .. .. "
Weekly Star and Wellington District Advertiser (M.) .. Thursday.
Otaki—
Otaki Mail and Horowhenua County and West Coast Advertiser (M.) .. .. Tues., Thur., Sat.
Pahiatua—
Pahiatua Herald (E.) .. .. Daily.
Palmerston North—
Manawatu Daily Standard, Rangitikei Advertiser, and West Coast Gazette (E.) .. .. .. Daily.
Manawatu Daily Times (M.) .. .. .. "
Petone—
Hutt and Petone Chronicle (E.) .. .. .. Tuesday, Friday.
Wellington—
Church Chronicle (M.) .. .. Monthly.
Evening Post (E.) .. .. Daily.
Mercantile Record (M.) .. .. Saturday.
New Zealand Craftsman (M.) .. .. .. Monthly.
New Zealand Dairyman and Farmers' Union Journal (E.) "
New Zealand Field (M.) .. .. .. Friday.
New Zealand Free Lance (M.) .. .. .. Saturday.
New Zealand Home Journal (E.) .. .. Monthly.
New Zealand Mail, Town and Country Advertiser (M) .. Wednesday.
New Zealand Mines Record (M.) .. .. .. Monthly.

Wellington—*continued.*
New Zealand Times (M.) .. .. .. Daily.
New Zealand Trade Review and Price Current (M.) .. Three-weekly.
Post and Telegraph Officers' Advocate (E.) .. .. Monthly (15th).
Prohibitionist (E.) .. .. Fri., fortnightly.
Woodville—
Examiner (E.) .. .. Mon., Wed., Fri.

BLENHEIM.

Blenheim—
Marlborough Daily Times and Town and Country Advertiser (M.) .. .. Daily.
Marlborough Express (E.) .. .. .. "
Havelock—
Pelorus Guardian and Miners' Advocate (M.) .. .. Tuesday, Friday.
Picton—
Marlborough Press, County of Sounds Gazette (M.) .. " "

NELSON.

Collingwood—
Golden Bay Argus (E.) .. .. Thursday.
Motueka—
Motueka Star (E) .. .. Tuesday, Friday.
Nelson—
Colonist (M.) .. .. Daily.
Nelson Evening Mail (E.) .. .. .. "
Takaka—
Takaka News and Collingwood Advertiser (E.) .. Thursday.

WESTPORT.

Charleston—
Charleston Herald, Brighton Times, and Croninville Reporter (M.) .. .. Wed., Saturday.
Murchison—
Buller Post (E.) .. .. Tuesday.
Westport—
Buller Miner (M.) .. .. Friday.
Westport News (M.) .. .. Daily.
Westport Times and Evening Star (E.) .. .. "

GREYMOUTH.

Greymouth—
Evening Star and Brunnerton Advocate (E.) .. .. Daily.
Grey River Argus (M.) .. .. "
Weekly Argus (M.) .. .. Weekly.
Reefton—
Inangahua Herald and New Zealand Miner (M.) .. Daily.
Inangahua Times and Reefton Guardian (E.) .. .. "

HOKITIKA.

Hokitika—
Hokitika Guardian and Evening Star (E.) .. .. Daily.
Leader (M.) .. .. Saturday.
West Coast Times (M.) .. .. Daily.
Kumara—
Kumara Times and Dillman's and Goldsborough Advertiser (E.) .. .. Daily.
Ross—
Ross and Okarito Advocate and Westland Advertiser (M.) Wed., Saturday.

CHRISTCHURCH.

Akaroa—
Akaroa Mail and Banks Peninsula Advertiser (M.) .. Tuesday, Friday.

Ashburton—	
Ashburton Daily News (E.)	Daily.
Ashburton Guardian (E.)	"
Ashburton Mail, Rakaia, Mount Somers, and Alford Forest Advertiser (M.)	Tues., Thur., Sat.
Cheviot—	
Cheviot News (M.)	Tuesday, Friday.
Christchurch—	
Canterbury Times (incorporating "Sportsman" and "New Zealand Cyclist") (M.)	Wednesday.
Lyttelton Times (M.)	Daily.
Mercantile and Bankruptcy Gazette of New Zealand (E.)	Wednesday.
New Zealand Church News (M.)	Monthly.
New Zealand Poultry-keeper and Fanciers' Chronicle (M.)	"
New Zealand Railway Review (E.)	"
New Zealand Schoolmaster (E.)	"
New Zealand War Cry and Official Gazette of the Salvation Army (M.)	Saturday.
New Zealand Wheelman and Motor News (M.)	Sat., fortnightly.
Press (M.)	Daily.
Spectator (M.)	Tuesday.
Star (E.)	Daily.
Truth (E.)	"
Weekly Press (incorporating "The Referee") (M.)	Wednesday.
White Ribbon (M.)	Monthly.
Kaikoura—	
Kaikoura Star and North Canterbury and South Marlborough News (E.)	Daily.
Rangiora—	
Standard and North Canterbury Guardian (M.)	Wed., Saturday.
Southbridge—	
Ellesmere Guardian (M.)	" "

TIMARU.

Temuka—	
Geraldine Guardian (M.)	Tues., Thur., Sat.
Temuka Leader (M.)	" " "
Timaru—	
Timaru Herald (M.)	Daily.
Timaru Post (E.)	"
Waimate—	
Waimate Advertiser (M.)	Tues., Thur., Sat.
Waimate Times (M.)	" " "

OAMARU.

Oamaru—	
North Otago Times (M.)	Daily.
Oamaru Mail (E.)	"

DUNEDIN.

Alexandra South—	
Alexandra Herald and Central Otago Gazette (M.)	Thursday.
Balclutha—	
Clutha Leader (M.)	Tuesday, Friday
Free Press (M.)	" "
Clyde—	
Dunstan Times, Vincent County Official Gazette, and General Goldfields Advertiser (M.)	Tuesday.
Cromwell—	
Cromwell Argus and Northern Goldfields Gazette (M.)	Tuesday.
Dunedin—	
Evening Star (E.)	Daily.
Farmers' Circular (M.)	Thur., fortn'ly
Farmers Standard of New Zealand (M.)	Monthly.

Dunedin—*continued.*
New Zealand Baptist (E.)* .. .. .. Monthly.
New Zealand Guardian (M.) .. .. .. "
New Zealand Journal of Education (M.) .. .. "
New Zealand Mining, Engineering, and Building Journal (M.) .. .. Thursday.
New Zealand Tablet (M.) .. .. .. "
Otago Daily Times (M.) .. .. .. Daily.
Otago Witness (M.) .. .. Thursday.
Otago Liberal and Workman (M) .. .. .. Saturday
Outlook (M.) .. .. "
Schoolmates (M.) .. .. Monthly.
Trade Review and Farmers' Gazette (M.) .. .. Thursday.
Triad (M.) .. .. Monthly.
Weekly Budget (M.) .. .. Saturday.

Lawrence—
Tuapeka Times (M.) .. .. Wed., Saturday.

Milton—
Bruce Herald (M.) .. .. Tuesday, Friday.

Mosgiel—
Taieri Advocate (M.) .. .. Wed., Saturday.

Naseby—
Mount Ida Chronicle (M.) .. .. .. Friday.

Palmerston—
Palmerston and Waikouaiti Times (M.) .. .. Friday.

Roxburgh—
Mount Benger Mail (M.) .. .. .. Saturday.

Tapanui—
Tapanui Courier and Central Districts Gazette (M.) .. Wednesday.

INVERCARGILL.

Arrowtown—
Lake County Press (E.) .. .. .. Thursday.

Gore—
Mataura Ensign (E.) .. .. Tues., Thur., Sat.
Southern Standard (M.) .. .. .. Tuesday, Friday.

Invercargill—
Southern Cross (M.) .. .. Saturday.
Southlander (M.) .. .. Friday.
Southland Daily News (E.) .. .. .. Daily.
Southland Times (M.) .. .. "
Weekly Times (M.) .. .. Friday.

Orepuki—
Orepuki Advocate (M.) .. .. Saturday.

Queenstown—
Lake Wakatipu Mail (E.) .. .. .. "

Riverton—
Western Star and Wallace County Gazette (E.) .. Tues., Friday.

Winton—
Winton Record and Hokonui Advocate (M.) .. .. Friday.

Wyndham—
Wyndham Farmer (M.) .. .. .. Mon., Wed., Fri.
Wyndham Herald (M.) .. .. .. Tuesday, Friday.

The foregoing towns are arranged according to the postal district in which they are situated.

Taking the provincial districts, Auckland has 37 publications registered as newspapers, Taranaki 11, Hawke's Bay 10, Wellington 45, Marlborough 4, Nelson 13, Westland 8, Canterbury 28, and Otago 44.

* Edited in Mosgiel by Rev. F. W. Boreham.

THE CUSTOMS TARIFF OF NEW ZEALAND,

Under the Customs and Excise Duties Acts, 1888 and 1895, "The Tobacco Excise Duties Act, 1896," "The Customs Duties Amendment Act, 1900," and "The Preferential and Reciprocal Trade Act, 1903." [*For rates under last-named Act, see p. 101.*]

Table of Duties.

The headings of the respective classes in this Table and in the Table of Exemptions are used solely for convenience of classification, and shall not in any way affect the articles specified therein, or be construed to indicate the material of which any such article is made.

The word "iron" includes steel, or steel and iron combined.

Neither steam-engines, nor parts of steam-engines, nor steam-boilers (land or marine) are included in the expression "machines" or "machinery" in either this Table or the Table of Exemptions.

The abbreviaton "n.o.e." means not otherwise enumerated.

In computing "ad valorem" duties the *invoice* value of the goods is increased by 10 per cent.

Class I.—Foods and Articles for Human Consumption.

Names of Articles and Rates of Duty.

1. Almonds, in shell, 2d. the lb.
2. Almonds, shelled, n.o.e., 3d. the lb.
3. Bacon and hams, 2d. the lb.
4. Biscuits, ships' plain and unsweetened, 3s. the cwt.
5. Biscuits, other kinds, 2d. the lb.
6. Boiled sugars, comfits, lozenges, Scotch mixtures, and sugar-candy, 2d. the lb., including internal packages.
7. Candied peel and drained peel, 3d. the lb.
8. Capers, caraway seeds, catsup, cayenne pepper, chillies, chutney, curry-powder and -paste, fish-paste, gelatine, isinglass, liquorice, olives, 20 per cent. *ad valorem.*
9. Chocolate confectionery, and all preparations of chocolate or cocoa—
   In plain trade packages, 3d. the lb.
   In fancy packages, or in small packages for retail sale, 20 per cent. *ad valorem.*
10. Confectionery n.o.e., 2d. the lb., including internal packages.
11. Currants, 1d. the lb.
12. Fish, dried, pickled, or salted, n.o.e., 10s. the cwt.
13. Fish, potted and preserved, 2d. the lb. or package of that reputed weight, and so in proportion for packages of greater or less reputed weight.*
14. Fruit, fresh, viz.:—
    Apples, pears, plums, cherries, peaches, nectarines, medlars, apricots, quinces, tomatoes, 1d. the lb.
    (No duty exceeding ½d. the lb. to be levied on apples and pears from 14th July to 31st December.)
    Currants, raspberries, gooseberries, blackberries, and strawberries, ½d. the lb.
    Lemons, ½d. the lb.
15. Fruits, dried, 2d. the lb.
16. Fruits, preserved in juice or syrup, 25 per cent. *ad valorem.*
17. Fruit-pulp, and partially preserved fruit n.o.e., 1½d. the lb.
18. Fruits preserved by sulphurous acid, 1d. the lb.
19. Glucose, 1d. the lb.
20. Honey, 2d. the lb.

* Such as is foreign produce or manufacture, subject to preferential duty, see p. 101.

21. Jams, jellies, marmalade, and preserves, 2d. the lb. or package of that reputed weight, and so in proportion for packages of greater or less reputed weight.
22. Jellies concentrated in tablets or powder, 4d. the lb.
23. Maizena and cornflour, ¼d. the lb.
24. Meats, potted or preserved, 20 per cent. *ad valorem*.
25. Milk, preserved, 25 per cent. *ad valorem*.
26. Mustard, 2d. the lb.
27. Nuts of all kinds, except cocoa-nuts, 2d. the lb.
28. Oysters, preserved, 2d. the lb. or package of that reputed weight, and so in proportion for packages of greater or less reputed weight.
29. Pearl barley, 1s. the cwt.
30. Peas, split, 2s. the cwt.
31. Pickles, 3s. the imperial gallon.
32. Provisions, n.o.e., 20 per cent. *ad valorem*.
33. Raisins, 1d. the lb.
34. Rice-flour, 6s. the cwt.
35. Sardines, including the oil, 2d. the lb.
36. Sauces, 4s. the imperial gallon.
37. Spices, including pepper and pimento, unground, 2d. the lb.
38. Spices, including pepper and pimento, ground, 4d. the lb.
39. Sugar, ½d. the lb.
40. Treacle and molasses, ½d. the lb.
41. Vegetables, fresh, dried, or preserved, 20 per cent. *ad valorem*.
42. Vinegar, table, not exceeding 6·5 per cent. of acidity,* 6d. the gallon.

Class II.—Tobacco.

43. Cigarettes, not exceeding in weight 2½ lb. per 1,000, 17s. 6d. the 1,000. And for all weight in excess of 2½ lb. per 1,000, 6d. the oz.
44. Cigars, 7s. the lb.
45. Snuff, 7s. the lb.
46. Tobacco, 3s. 6d. the lb.
47. Tobacco, unmanufactured, entered to be manufactured in the colony in any licensed tobacco manufactory, for manufacturing purposes only, into tobacco, cigars, cigarettes, or snuff, 2s. the lb.

Class III.—Alcoholic Beverages, and Materials for Making Same.

48. Ale, beer of all sorts, porter, cider, and perry, the gallon, or for six reputed quart bottles, or 12 reputed pint bottles, 2s. the gallon.
49. Cordials, bitters, and liqueurs, 16s. the liquid gallon.
50. Hops, 6d. the lb.†
51. Malt, 2s. the bushel.
52. Rice malt, 1d. the lb.
53. Solid wort, 6d. the lb.
54. Spirits and strong waters, the strength of which can be ascertained by Sykes's hydrometer, 16s. the proof gallon.
    (No allowance beyond 16·5 under proof shall be made for spirits or strong waters of a less hydrometer strength than 16·5 under proof.)
55. Spirits and strong waters, sweetened or mixed, when not exceeding the strength of proof, 16s. the liquid gallon.
56. Spirits and strong waters in cases shall be charged as follows, namely:—
    Two gallons and under, as two gallons; over two gallons and not exceeding three, as three gallons; over three gallons and not exceeding four, as four gallons; and so on for any greater quantity contained in any case.

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* Vinegar exceeding 6·5 per cent. of acidity to be treated as acetic acid.
† Such as is foreign produce or manufacture, subject to preferential duty, see p. 101.

57. Spirits or strong waters, mixed with ingredients in any proportion exceeding 33 per cent. of proof spirit, and although thereby coming under any other designation, excepting patent or proprietary medicines, or tinctures and medicinal spirits otherwise enumerated, 16s. the liquid gallon.
58. Wine, Australian, containing not more than 35 per cent. of proof spirit verified by Sykes's hydrometer, the gallon, or for six reputed quart bottles, or twelve reputed pint bottles, 5s. the gallon.
59. Wine, other than sparkling and Australian, containing less than 40 per cent. of proof spirit verified by Sykes's hydrometer, the gallon, or for six reputed quart bottles, or twelve reputed pint bottles, 6s. the gallon.
60. Wine, sparkling, 9s. the gallon.

Class IV.—Non-alcoholic Beverages, and Materials for Making Same.

61. Aerated and mineral waters and effervescing beverages, 20 per cent. *ad valorem.*
62. Chicory, 3d. the lb.
63. Chocolate, 3d. the lb.
64. Cocoa, 3d. the lb.
65. Coffee, essence of, 20 per cent. *ad valorem.*
66. Coffee, roasted, 3d. the lb.
67. Syrups; lime- or lemon-juice sweetened; raspberry vinegar, 25 per cent. *ad valorem.*
68. Tea, 2d. the lb.*

Class V.—Drugs, Medicines, Chemicals, and Druggists' Sundries.

69. Acid, acetic, n.o.e., containing not more than 30 per cent. of acidity, 1½d. the lb.
    For every 10 per cent. of acidity or fraction thereof additional, ½d. the lb.
70. Acid, tartaric, 1d. the lb.
71. Baking-powder, yeast preparations, and other ferments, 20 per cent. *ad valorem.*
72. Chemicals n.o.e., including photographic chemicals, and glacial acetic acid (B.P. standard), 15 per cent. *ad valorem.*
73. Cream of tartar, 1d. the lb.*
74. Drugs and druggists' sundries and apothecaries' wares, n.o.e., 15 per cent. *ad valorem.*
75. Essences, flavouring, spirituous, 16s. the liquid gallon.
76. Essences, flavouring, n.o.e., 15 per cent. *ad valorem.*
77. Eucalyptus oil, in bulk or bottle, 20 per cent. *ad valorem.*
78. Glycerine, refined, 20 per cent. *ad valorem.*
79. Opium, 40s. the lb.
80. Patent medicines, 15 per cent. *ad valorem.*
81. Proprietary medicines, or medicaments, (1) bearing the name of the proprietor on label or package; (2) bearing a prefixed name in the possessive case; (3) n.o.e., prepared by any occult secret or art, 15 per cent. *ad valorem.*
82. Saccharine, except in the form of tabloids or tablets, 1s. 6d. the ounce.
83. Sarsaparilla, 15 per cent. *ad valorem.*
84. Soda, carbonate and bicarbonate, 1s. the cwt.
85. Soda, crystals, 2s. the cwt.
86. Tinctures and medicinal spirits of any recognised pharmacopœia, containing more than 50 per cent. of proof spirit, 1s. the lb.
87. Tinctures and medicinal spirits of any recognised pharmacopœia, containing 50 per cent. proof spirit or less, 15 per cent. *ad valorem.*

* Such as is foreign produce or manufacture, subject to preferential duty, see p. 101.

Class VI.—Clothing and Textile Goods.

88. Apparel and ready-made clothing, and all articles n.o.e. made up wholly or in part from textile or other piece-goods, 25 per cent. *ad valorem.*
89. Apparel made by British or foreign tailors, dress-, mantle-, or jacket-makers, to the order of residents in the colony, and intended for the individual use of such residents, whether imported by the residents themselves or through an importing firm, 40 per cent. *ad valorem.*
90. Blankets, 20 per cent. *ad valorem.*
91. Collars and cuffs, of paper or other material, 25 per cent. *ad valorem.*
92. Cotton counterpanes, 20 per cent. *ad valorem.*
93. Cotton piece-goods, to include turkey twills, dress prints (hard-spun and plain-woven), where the invoice value does not exceed 4d. the yard; and cotton piece-goods n.o.e., 10 per cent. *ad valorem.*
94. Cotton piece-goods—namely, tapestry; cretonnes; chintz art crêpe, and serges; velveteens, velvets, and plushes, all kinds; damasks; moquette; sateens; linenettes; crepons; crimps; zephyrs; ginghams; turkey twills; prints; printed cottons; piqués; vestings; quiltings, and marcellas; muslins of all kinds; nets; window-nets; hollands, curtains, and blinds; diapers; ticks, including coloured Belgian; towellings; laces, 20 per cent. *ad valorem.*
95. Drapery n.o.e., 20 per cent. *ad valorem.*
96. Feathers, ornamental (including ostrich), and artificial flowers, 25 per cent. *ad valorem.*
97. Forfar, dowlas, and flax sheeting, n.o.e., 20 per cent. *ad valorem.*
98. Furs, 25 per cent. *ad valorem.*
99. Haberdashery n.o.e., 20 per cent. *ad valorem.*
100. Hats of all kinds, including straw hats, also caps, 25 per cent. *ad valorem.*
101. Hosiery n.o.e., 20 per cent. *ad valorem.*
102. Lace, and laces, n.o.e., 25 per cent. *ad valorem.*
103. Millinery of all kinds, including trimmed hats, caps, and bonnets, 25 per cent. *ad valorem.*
104. Ribbons and crape, all kinds, 25 per cent. *ad valorem.*
105. Rugs, woollen, cotton, opossum, or other, 20 per cent. *ad valorem.*
106. Shawls, 20 per cent. *ad valorem.*
107. Silks, satins, velvets, plushes, n.o.e., composed of silk mixed with any other material, in the piece, 25 per cent. *ad valorem.*
108. Textile piece-goods other than cotton or silk, 20 per cent. *ad valorem.*
109. Umbrellas, parasols, and sunshades, 20 per cent. *ad valorem.*
110. Yarns n.o.e., 20 per cent. *ad valorem.*

Class VII.—Leather and Manufactures of Leather.

111. Boots, shoes, and slippers, n.o.e.; goloshes, clogs, pattens, vamps, uppers, and laces, 22½ per cent. *ad valorem.**
112. Heel-plates, and toe-stiffeners and plates, 22½ per cent. *ad valorem.*
113. Leather—
    Leather belting, and belt-leather, harness, bridle, legging, bag, kip (other than East India), 4d. the lb.
    Buff and split, including satin hides and tweeds, 3d. the lb.
    Cordovan, levanted leather, roans, sheepskins, morocco n.o.e., basils, 3d. the lb.
    Sole-leather, 2d. the lb.
    East India kip, Persians, lambskins and goatskins (dressed other than morocco), kangaroo and wallabi skins (dressed), tan and coloured calf, 2d. the lb.
    Leather n.o.e., 1d. the lb.
114. Leather board or compo, 4d. the lb.

* Such as is foreign produce or manufacture, subject to preferential duty, see p. 101.

115. Leather bags and leather-cloth bags, n.o.e., 20 per cent. *ad valorem.*
116. Leather, chamois, 20 per cent. *ad valorem.*
117. Leather cut into shapes, 22½ per cent. *ad valorem.*
118. Leather leggings, 22½ per cent. *ad valorem.*
119. Leather manufactures n.o.e., 20 per cent. *ad valorem.*
120. Portmanteaux; trunks; travelling-bags and brief-bags of leather or leather-cloth, 10 in. in length and upwards, and carpet-bags, 25 per cent. *ad valorem.*
121. Saddlery, and harness, whips and whip-thongs, 20 per cent. *ad valorem.*

Class VIII.—Furniture and Household Furnishing.

122. Basket- and wicker-ware n.o.e., not being furniture, 20 per cent. *ad valorem.**
123. Carpets, and druggets; floorcloth; mats, and matting, 20 per cent. *ad valorem.*
124. Desks, 20 per cent. *ad valorem.*
125. Furniture and cabinetware, n.o.e., and other than iron, 25 per cent. *ad valorem.**
126. Furniture-, knife-, and plate-powder and polish, 20 per cent. *ad valorem.*
127. Mantelpieces, other than stone, 20 per cent. *ad valorem.*
128. Upholstery n.o.e., 25 per cent. *ad valorem.*

Class IX.—China, Glass, and Earthen Goods.

129. Bricks, known as firebricks, 20 per cent. *ad valorem.*
130. China, porcelain, and parianware, 20 per cent. *ad valorem.**
131. Drainage pipes and tiles, 20 per cent. *ad valorem.*
132. Earthen flooring and garden-tiles, 20 per cent. *ad valorem.*
133. Earthenware, stoneware, and brownware, 20 per cent. *ad valorem.**
134. Filters, 20 per cent. *ad valorem.*
135. Fireclay, ground, and fireclay goods, 20 per cent. *ad valorem.*
136. Glass, crown, sheet, and common window, 2s. the 100 superficial feet.*
137. Glassware; also plate-glass, and glass polished, coloured, and other kinds, n.o.e.; globes and chimneys for lamps, 20 per cent. *ad valorem.**
138. Lamps, lanterns, and lampwick, 20 per cent. *ad valorem.**
139. Plate-glass, bevelled or silvered; mirrors and looking glasses, framed or unframed, 25 per cent. *ad valorem.*

Class X.—Fancy Goods, Musical Instruments, etc.

140. Artificial flies, 25 per cent. *ad valorem.*
141. Cards, playing, 6d. per pack.
142. Clocks, 20 per cent. *ad valorem.**
143. Dressing-cases, 20 per cent. *ad valorem.*
144. Fancy goods, and toys, 20 per cent. *ad valorem.**
145. Fishing tackle, including artificially-baited hooks other than flies, 20 per per cent. *ad valorem.*
146. Jewellery; plate, gold or silver†; greenstone, cut or polished, 20 per cent. *ad valorem.*
147. Mouldings in the piece for picture-frames, cornices, or ceilings 15 per cent. *ad valorem.*
148. Musical instruments of all kinds n.o.e., 20 per cent. *ad valorem.*‡
149. Oil, perfumed, 25 per cent. *ad valorem.*
150. Papier-maché ware, 20 per cent. *ad valorem.*
151. Perfumery n.o.e., 25 per cent. *ad valorem.*
152. Perfumed spirits and Cologne-water, £1 10s. the liquid gallon.

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* Such as is foreign produce or manufacture, subject to preferential duty, see p. 101.

† Plate, gold or silver, if of foreign produce or manufacture, subject to preferential duty, see p. 101.

‡ Pianos, if of foreign manufacture, are subject to preferential duty, see p. 101.

153. Photographic goods n.o.e., 20 per cent. *ad valorem.*
154. Pictures, paintings, drawings, engravings, and photographs, framed or unframed; picture- or photograph-frames and -mounts, 20 per cent. *ad valorem.*
155. Platedware, 20 per cent. *ad valorem.**
156. Statues, statuettes, casts, and bronzes, 20 per cent. *ad valorem.*
157. Tobacco-pipes and -cases, cigar- and cigarette-holders and -cases, cigarette-papers and -cases, 25 per cent. *ad valorem.*
158. Toilet preparations n.o.e., 25 per cent. *ad valorem.*
159. Watches, 20 per cent. *ad valorem.*
160. Walking-sticks, 20 per cent. *ad valorem.*

Class XI.—Paper Manufactures and Stationery.

161. Calendars and show-cards, all kinds, 25 per cent. *ad valorem.*
162. Cardboard boxes complete, or cardboard cut and shaped for boxes (including match-boxes), 25 per cent. *ad valorem.*
163. Directories of New Zealand, or of any part thereof; also covers for directories, 25 per cent. *ad valorem.*
164. Handbills, programmes and circulars, playbills and printed posters, 20 per cent. *ad valorem.*
165. Ink, writing, 20 per cent. *ad valorem.*
166. Paper bags, coarse (including sugar-bags), 7s. 6d. the cwt.
167. Paper bags n.o.e., 25 per cent. *ad valorem.*
168. Paper-hangings, 15 per cent. *ad valorem.**
169. Paper wrapping—viz., blue candle, glazed cap, glazed casings, small hand, lumber hand, and tissue, 5s. the cwt.*
170. Paper, wrapping, other kinds, including brown, cartridge, and sugar papers, 5s. the cwt.*
171. Printing matter relating to patent or proprietary medicines; trade catalogues, price-lists, and fashion-plates of the goods of firms or persons in the colony, 25 per cent. *ad valorem.*
172. Stationery and writing-paper n.o.e., 20 per cent. *ad valorem.*
173. Stationery, manufactured—viz., account-books; manuscript books; bill-head, invoice, and statement forms; printed or ruled paper; counter-books; cheque- and draft-forms; tags; labels; blotting-pads; sketch-books; book-covers; copying letter-books; manifold writers; albums (other than for photographs); diaries; birthday-books; plain or faint-lined ruled books; printed window-tickets; printed, lithographed, or embossed stationery; and Christmas, New Year, birthday, and Easter cards and booklets, 25 per cent. *ad valorem.*
174. Stereotypes and matrices, 25 per cent. *ad valorem.*

Class XII.—Manufactures of Metal.

175. Bicycles, tricycles, and the like vehicles; also finished or partly finished or machined parts of same, n.o.e., including weldless steel tubing cut to short lengths, 20 per cent. *ad valorem.**
176. Boilers, land and marine, 20 per cent. *ad valorem.*
177. Brass cocks, valves, unions, lubricators, and whistles, 20 per cent. *ad valorem.*
178. Brass manufactures, n.o.e., 20 per cent. *ad valorem.*
179. Cartridges (shot), 10- to 24-bore, 1s. 6d. the 100.
180. Cartridge cases, 9d. the 100.
181. Cartridges n.o.e., 20 per cent. *ad valorem.*
182. Cash-registering machines, 10 per cent. *ad valorem.*
183. Coffin-furniture, 20 per cent. *ad valorem.*
184. Composition-piping, 3s. 6d. the cwt.
185. Copper manufactures n.o.e., 20 per cent. *ad valorem.*
186. Copying-presses, 20 per cent. *ad valorem.*

* Such as is foreign produce or manufacture, subject to preferential duty, see p. 101.

187. Crab-winches, cranes n.o.e., capstans, and windlasses, 20 per cent. *ad valorem.*
188. Cutlery, 20 per cent. *ad valorem.*
189. Firearms, all kinds, 20 per cent. *ad valorem.**
190. Galvanised iron manufactures n.o.e., 25 per cent. *ad valorem.*
191. Gasometers, and other apparatus for producing gas; also gas-meters, 10 per cent. *ad valorem.*
192. Gaspipes, iron, 5 per cent. *ad valorem.*
193. Hardware, ironmongery, and holloware, 20 per cent. *ad valorem.**
194. Iron bridges, and iron material n.o.e. for the construction of bridges, wharves, jetties, or patent slips, 20 per cent. *ad valorem.*
195. Iron columns for buildings, and other structural ironwork, 20 per cent. *ad valorem.*
196. Iron doors for safes and vaults, 20 per cent. *ad valorem.*
197. Iron, galvanised corrugated sheets, screws, and nails, 2s. per cwt.
198. Iron galvanised tiles, ridging, guttering, and spouting, 20 per cent. *ad valorem.*
199. Iron gates and gate-posts, staples, standards, straining posts and apparatus, 20 per cent. *ad valorem.*
200. Iron nails, 2s. per cwt.*
201. Iron pipes, and fittings for same, including main-cocks, 5 per cent. *ad valorem.**
202. Iron, plain galvanised sheet and hoop, 1s. 6d. the cwt.
203. Iron tanks, exceeding 200 gallons and not exceeding 400 gallons, 10s. each.
204. Iron tanks of and under 200 gallons, 5s. each.
205. Iron work and wire work, 20 per cent. *ad valorem.*
206. Japanned and lacquered metal ware, 25 per cent. *ad valorem.*
207. Lawn-mowers, 20 per cent. *ad valorem.*
208. Lead, in sheets, 1s. 6d. the cwt.
209. Lead piping, 3s. 6d. the cwt.
210. Machinery n.o.e., 20 per cent. *ad valorem.*
211. Machinery, electric, and appliances, 10 per cent. *ad valorem.*
212. Machinery for flour-mills, woollen-mills, paper-mills, rope- and twine-making, dredging, saw-milling,† planing,† oil-refining, boring; and also machinery for refrigerating or preserving meat, leather-splitting machines and band-knives for same, 5 per cent. *ad valorem.*
213. Manufactures, n.o.e., of metal, or of metal in combination with any other material, 20 per cent. *ad valorem.*
214. Nails n.o.e., 3s. the cwt.
215. Printing machines and presses, 5 per cent. *ad valorem.*
216. Pumps and other apparatus for raising water n.o.e., 20 per cent. *ad valorem.**
217. Railway and tramway plant and materials n.o.e., 20 per cent. *ad valorem.*
218. Sad-irons, 20 per cent. *ad valorem.*
219. Shot, 10s. the cwt.
220. Soda-water machines; also, machines for aerating liquids, 5 per cent. *ad valorem.*
221. Steam-engines and parts of steam-engines n.o.e., 20 per cent. *ad valorem.*
222. Steam-engines, and parts thereof, including the boiler or boilers therefor, imported specially for mining or gold-saving purposes and processes, or for dairying purposes, 5 per cent. *ad valorem.*
223. Tinware, and tinsmiths' furniture n.o.e., 25 per cent. *ad valorem.*
224. Waterworks pipes, iron, 5 per cent. *ad valorem.*
225. Weighbridges and weighing-machines, 20 per cent. *ad valorem.*
226. Wire mattresses and webbing, 20 per cent. *ad valorem.*
227. Zinc tiles, ridging, guttering, piping, 20 per cent. *ad valorem.*
228. Zinc manufactures n.o.e., 25 per cent. *ad valorem.*

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* Such as is foreign produce or manufacture, subject to preferential duty, see p. 101.
† See also item 418.

Class XIII.—Timber, and Articles made from Timber.

229. Bellows, other than forge, 20 per cent. *ad valorem.*
230. Blocks, wooden tackle, 20 per cent. *ad valorem.*
231. Buckets and tubs, of wood, 20 per cent. *ad valorem.*
232. Carriages, carts, drays, wagons, and perambulators, and wheels for the same, 20 per cent. *ad valorem.**
233. Carriage shafts, spokes, and felloes, dressed; bent carriage timber, n.o.e., 20 per cent. *ad valorem.*
234. Doors, glazed with ornamental glass, 4s. each.
235. Doors, plain, 2s. each.
236. Sashes, glazed, with ornamental glass, 4s. the pair.
237. Sashes, plain, 2s. the pair.
238. Timber, palings, 2s. the 100.
239. Timber, posts, 8s. the 100.
240. Timber, rails, 4s. the 100.
241. Timber, sawn, dressed, 4s. the 100 ft. superficial.
242. Timber, sawn, rough, 2s. the 100 ft. superficial.
243. Timber, shingles and laths, 2s. the 1,000.
244. Woodenware and turnery n.o.e, and veneers, 20 per cent. *ad valorem.*

Class XIV.—Oils, Paints, etc.

245. Axle-grease, and other solid lubricants, 20 per cent. *ad valorem.*
246. Harness oil and composition, and leather dressing, 20 per cent. *ad valorem.*
247. Naphtha, 6d. the gallon.
248. Oil, linseed, 6d. the gallon.
249. Oil, mineral, including shale-waste or unrefined mineral-oil n.o.e., 6d. the gallon.
250. Oil n.o.e., 6d. the gallon.
251. Oil, olive, in bulk, 6d. the gallon.
252. Oil vegetable, in bulk, n.o.e., 6d. the gallon.
253. Oil vegetable or other, in bottle, 15 per cent. *ad valorem.*
254. Paints and colours ground in oil or turpentine, 2s. 6d. the cwt.
255. Paints and colours mixed ready for use, 5s. the cwt.
256. Putty, 2s. the cwt.
257. Stearine, 1½d. the lb.
258. Stearine for match-making, ¾d. the lb.
259. Varnish; enamel paints; gold size, 2s. the gallon.
260. Whiting and chalk, 1s. the cwt.

Class XV.—Agricultural and Farm Products, etc.

261. Animals, food for, of all kinds, n.o.e., 20 per cent. *ad valorem.*
262. Cattle (horned), 10s. each.
263. Chaff, £1 the ton.
264. Grain—namely, barley, 2s. the 100 lb.
265. Grain and pulse of every kind n.o.e., 9d. the 100 lb.
266. Grain and pulse of every kind, when ground or in any way manufactured, n.o.e., 1s. the 100 lb.
267. Horses, £1 each.
268. Linseed, £1 the ton.
269. Maize, 9d. the 100 lb.
270. Onions, £1 the ton.
271. Prepared calf-meal, £1 5s. the ton.

Class XVI.—Miscellaneous.

272. Bags, flour, 20 per cent. *ad valorem.*
273. Bags, calico, forfar, hessian, and linen, 20 per cent. *ad valorem.*
274. Bagging and bags n.o.e., 15 per cent. *ad valorem.*

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* Such as is foreign produce or manufacture, subject to preferential duty, see p. 101

275. Blacking and boot-gloss, 20 per cent. *ad valorem.*
276. Blacklead, 20 per cent. *ad valorem.*
277. Blue, 2d. the lb.
278. Brooms, brushes, and brushware, n.o.e., 25 per cent. *ad valorem.*
279. Brushes, hair, and combs; toilet- clothes- and hat-brushes, 20 per cent. *ad valorem.*
280. Candles, 1d. the lb. or package of that reputed weight, and so in proportion for packages of greater or less reputed weight.*
281. Cement, 2s. the barrel.*
282. Cordage and rope, n.o.e., 20 per cent. *ad valorem.**
283. Cork, cut, including bungs, 20 per cent. *ad valorem.*
284. Fireworks n.o.e., 20 per cent. *ad valorem.*
285. Flock, 10 per cent. *ad valorem.*
286. Glue and size, 1½d. the lb.
287. Granite, sawn on not more than two sides, and not dressed or polished, 5 per cent. *ad valorem.*
288. Marble, granite, and other stone, dressed or polished, and articles made therefrom, including mantelpieces, 25 per cent. *ad valorem.*
289. Matches—
    Wooden, in boxes containing not more than 60 matches, 1s. the gross of boxes.
    In boxes containing over 60 and not more than 100 matches, 2s. the gross of boxes.
    In boxes containing more than 100 matches, for every 100 matches or fraction thereof contained in one box, 2s. the gross of boxes.
    Wax, "plaid vestas" in cardboard boxes containing under 100 matches, 1s. the gross of boxes.
    "Pocket vestas" in tin or other boxes containing under 100 matches, 1s. 4d. the gross of boxes.
    "Sportsman's," "Ovals," and "No. 4 tin vestas," in boxes containing not more than 200 matches, 4s. 6d. the gross of boxes.
    Wax, other kinds, for every 100 matches or fraction thereof contained in one box, 2s. 3d. the gross of boxes.
290. Nets and netting, 20 per cent. *ad valorem.*
291. Paraffin wax, ¾d. the lb.
292. Powder, sporting, 6d. the lb.
293. Sacks, other than cornsacks and jute sacks, 15 per cent. *ad valorem.*
294. Sausage-skins and casings (including brine or salt), 3d. per lb.
295. Soap, common yellow, and blue mottled, 5s. the cwt.
296. Soap, n.o.e., 25 per cent. *ad valorem.*
297. Soap-powder, extract of soap, dry soap, and soft-soap, 20 per cent. *ad valorem.*
298. Spirits, methylated, 1s the liquid gallon.
299. Spirits, cleared from warehouse, methylated, under prescribed conditions, 6d. the liquid gallon.
300. Starch, 2d. the lb.
301. Tarpaulins, tents, rick- and wagon-covers, 20 per cent. *ad valorem.*
302. Twine n.o.e., 20 per cent. *ad valorem.*
303. Washing-powder, 20 per cent. *ad valorem.*
304. Wax, mineral, vegetable, and Japanese, 1½d. the lb.

In addition to any duty chargeable by law on any goods imported into the colony, a further duty of 20 per cent. *ad valorem* shall be charged when the goods are prison-made.

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* Such as is foreign produce or manufacture, subject to preferential duty, see p. 101.

TABLE OF EXEMPTIONS FROM DUTIES OF CUSTOMS.

Class I.—Foods, etc.

Names of Articles.

305. Almonds, Barbary, Sicily, and French, used in confectioners' manufactures.
306. Anchovies, salted, in casks.
307. Arrowroot, sago, tapioca, macaroni, vermicelli, and prepared groats.
308. Salt.
309. Rice, dressed or undressed.
310. Rice manufactured into starch in bond.

Class IV.—Non-alcoholic Beverages, etc.

311. Cocoa-beans.
312. Coffee, raw.

Class V.—Drugs, etc.

313. Acids—viz.: boracic; carbolic, in bulk; fluoric; muriatic; nitric; oxalic; oleic; picric; pyrogallic; salicylic; sulphuric.
314. Concentrated extracts or essences in liquid form or preserved in fat for perfume-manufacturing purposes in manufacturing warehouses, in bottles of not less than 1 lb. in weight.
315. Disinfectants.
316. Drugs and chemicals—viz.: alum; sulphate of aluminium; sulphate of ammonia; anhydrous ammonia; aniline dyes; arsenic; bluestone, or sulphate of copper; borax; catechu; chloride of calcium; nitrate of silver; cochineal; creosote, crude or commercial; glycerine, crude; gum, arabic and tragacanth; gum benzoin; artificial gum arabic; gum damar; phosphorus; potash, caustic potash, and chlorate of potash; pearlash; prussiate of potash; cyanide of potassium; cyanide of sodium; liquid chlorine; sal-ammoniac; saltpetre; acetate of soda, crude; soda-ash; caustic soda; nitrate of soda; silicate of soda; sulphate of soda; sulphide of sodium; hyposulphite of sodium; strychnine; sulphur; chloride of zinc; iron-sulphates; gall-nuts; turmeric; saffron; nitrous-oxide gas; tree-washes; insecticides; maltine; chlorodyne.
317. Essential oils, except eucalyptus; cod-liver oil; oil of rhodium.
318. Horse-drenches.
319. Medicinal barks, leaves, herbs, flowers, roots and gums.
320. Scrub-exterminator.
321. Sheep-dip; sheep-drenches; sheep-licks.
322. Surgical and dental instruments and appliances.*
323. Scientific and assay balances, retorts, flasks, and other appliances for chemical analysis and assay work.
324. Water-hardening chemicals for brewers' use.

Class VI.—Clothing and Textiles.

325. Accoutrements for military purposes, excepting uniform clothing.†
326. Brace-elastic and brace-mountings.
327. Bunting, in the piece.
328. Butter- and cheese-cloth.
329. Buttons, tapes, wadding, pins, needles.
330. Calico, white and grey, also cotton sheetings, in the piece.

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* If of foreign manufacture subject to duty see p. 101.

† Subject to the provisions of section 28 of "The Defence Act, 1900," as follows:—

Equipments to be admitted free of Customs Duty.

"28. All military clothing, saddlery, and equipments imported into the colony for the *bonâ fide* use of a Volunteer corps shall, on the certificate in writing of the Minister of Defence that the same are or have been imported for such purpose, be admitted into the colony free of Customs duty."

331. Corduroy, moleskin, and plain beaver-skin, of cotton, in the piece.
332. Coloured cotton shirtings; flannelette shirtings.*
333. Forfar, dowlas, and flax sheeting, when cut up under supervision in sizes not exceeding 47 in. x 36 in. for making flour-bags, and not exceeding 54 in. for lining wool mats.
334. Fur-skins, green or sun-dried.
335. Gold or silver lace or braid for military clothing.
336. Hatmakers' materials—viz.: silk plush; felt hoods; shellac; galloons; calicoes; spale-boards for hat-boxes; leathers and linings; blocks; moulds; frames; ventilators; and tassels.
337. Hessians, plain or striped, and scrim.
338. Leather-cloth.
339. Minor articles (required in the making-up of apparel, boots, shoes, hats, caps, saddlery, umbrellas, parasols, and sunshades), enumerated in any order of the Commissioner, and published in the *Gazette*.
340. Sailcloth, canvas, and unbleached double-warped duck, in the piece.†
341. Sewing cottons, silks, and threads; crochet, darning, and knitting cottons; angola mendings not exceeding 45 yards, on cards.
342. Silk for flour-dressing.
343. Silk twist (shoemakers' and saddlers').
344. Staymakers' binding, eyelets, corset-fasteners, jean, ticks, lasting, sateen, and cotell.
345. Tailors' trimmings—viz.: plain-coloured imitation hair-cloth; canvas; plain Verona and plain diagonal, and such patterns of checked Italian cloth as may be approved of by the Commissioner of Customs; Italian cloth of cotton or wool; buckram; wadding and padding; silk, worsted, and cotton bindings and braids; stay-bindings; Russia braids; shoulder-pads; buckles; silesias; drab, slate, and brown jeans; pocketings; slate, black, and brown dyed unions and linens.
346. Umbrella-makers' materials—viz.: reversible and levantine silk mixtures, gloria, and satin de chêne of not less than 44 in. in width; alpaca cloth, with border; zanella cloth, with border; also other piece-goods on such conditions as the Commissioner may approve; sticks, runners, notches, caps, ferrules, cups, ribs, stretchers, tips, and rings.
347. Union shirtings the invoice value of which does not exceed 6d. the yard.*
348. Waterproof material in the piece.

Class VII.—Leather, and Articles used in Leather Manufactures.

349. Boot elastic.
350. Bootmakers' linings, canvas, plain or coloured, bag and portmanteau linings, of such materials, qualities, and patterns as may be approved by the Commissioner.
351. Boots, shoes, and slippers—viz., children's, No. 0 to 3.
352. Cork soles, and sock soles.
353. East India kip, crust or rough-tanned, but undressed.
354. Goatskins, crust or rough-tanned, but undressed.
355. Grindery, except heel- and toe-plates.
356. Hogskins.
357. Kangaroo-, wallabi-skins, undressed.
358. Leather, japanned or enamelled; goatskins, dressed as morocco, coloured (other than black).
359. Saddle-trees.

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* Whenever any dispute arises as to the application of the exemption in favour of coloured cotton, flannelette, or union shirtings, in the case of fabrics alleged to be such shirtings, the Commissioner has power to decide such dispute; and in case of doubt on his part, he may require the fabric in dispute to be cut up for shirt-making, under such conditions as he prescribes. (See section 6 of "The Customs and Excise Duties Act, 1895.")

† If of foreign manufacture subject to duty, see p. 101.

360. Saddlers' ironmongery (except bits and stirrup-irons), hames, and mounts for harness; straining, surcingle, brace, girth, and roller webs; collar-check, and the same article plain, of such quality as may be approved by the Commissioner; legging-buckles.
361. Tanning materials, crude.

Class VIII.—Furniture, etc.

362. Blind-webbing and tape.
363. Upholsterers' webbing, hair-seating, imitation hair-seating; curled hair; gimp and cord of wool, cotton, or silk; tufts, and studs.

Class IX.—China, Glass, etc.

364. Bottles, empty, plain glass, not being cut or ground; also, jars up to 3 in. in diameter at the mouth.
365. Glass plates (engraved) for photo-lithographic work.
366. Jars or other dutiable vessels, containing free goods or goods subject to a fixed rate of duty, and being ordinary trade packages for the goods contained in them.

Class X.—Fancy Goods, etc.

367. Action-work and keys, in frames or otherwise, for manufacture of organs, harmoniums, and pianos; organ-pipes and stop-knobs.
368. Artists' canvas, colours, brushes, and palette knives.
369. Magic-lanterns, lenses, and slides.
370. Microscopes and astronomical telescopes, and lenses for same.
371. Musical instruments, specially imported for Volunteer bands.
372. Paintings, statuary, and works of art, presented to or imported by any public institution or art association registered as a body corporate, for display in the buildings of such institution or association, and not to be sold or otherwise disposed of.
373. Photographic cameras and lenses.
374. Photographs of personal friends in letters or packets.
375. Precious stones, cut or uncut and unmounted.
376. Sensitized surfaces for photographic purposes.

Class XI.—Paper, etc.

377. Bookbinders' materials—viz., cloth, leather, thread, headbands, webbing, end-papers, tacketing-gut, marbling-colours, marble-paper, blue paste for ruling-ink, staple presses, wire-staples, staple-sticks.
378. Butter-paper, known as parchment paper or waxed paper.
379. Cardboard and pasteboard, of sizes not less than that known as "royal."
380. Cardboard boxes, material for—viz., gold and silver paper, plain and embossed, gelatine and coloured papers, known as "box-papers."
381. Cartridge-paper for drawing-books.
382. Cloth-lined boards, not less than "royal."
383. Cloth-lined papers, enamelled paper; ivorite and gelatine; metallic paper; not less than "demy."
384. Copy-books and drawing-books.
385. Copying-paper, medium and double-foolscap, in original mill wrappers and labels.
386. Hand-made cheque-paper.
387. Ink, printing.
388. Masticated para.
389. Millboard, and bookbinders' leather-board.
390. Paper, hand-made or machine-made book or writing, of sizes not less than the size known as "demy," when in original wrappers.
391. Printing-paper.*
392. Printed books, papers, and music, n.o.e.
393. School slates, and educational apparatus.

* If of foreign manufacture, subject to duty, see p. 101.

Class XII.—Metals.

394. All machinery for agricultural purposes, including chaff-cutters, corn-crushers; corn-shellers, also articles used in manufacturing the same—viz., chaff-cutting knives, tilt-rakes, fittings for threshing-mills, forgings for ploughs.
395. All agricultural implements.
396. All bolts and nuts, blank or screwed nuts, black or finished nuts.
397. Anchors.
398. Artificers' tools.
399. Axes and hatchets; spades, shovels, and forks; picks; mattocks; quartz and knapping-hammers; scythes, sheep-shears, reaping-hooks; soldering-irons; paperhangers' scissors; butchers' saws and cleavers.
400. Axles, axle-arms, and boxes.
401. Band-saws and folding-saws, including frames.
402. Bellows-nails.
403. Bicycles and tricycles, fittings for—viz., rubber-tires, pneumatic-tires, outside covers, and inner tubes; rubber and cork handles, and pedal-rubbers; also drop-forgings and stampings, ball-bearings, weldless steel tube in full lengths, rims, forks, and spokes, in the rough.*
404. Blacksmiths' anvils, forges, and fans.
405. Blowers.
406. Brass and copper, in pigs, bars, tubes, or sheets.
407. Brass tubing and stamped work, in the rough, for gasaliers and brackets.
408. Caps, percussion.
409. Card-clothing for woollen-mills.
410. Chain pulleys, and chains for same.
411. Chains, trace and plough chains; or metal articles required to repair or complete riding or driving harness or saddlery to be repaired or made in the colony.
412. Chamfering, crozing and howelling machine for cask-making.
413. Copper and composition, rod, bolts, sheathing, and nails.
414. Couch-roll jackets, machine-wires, beater-bars, and strainer-plates for paper-mills.
415. Crucibles.
416. Emery-grinding machines and emery-wheels.
417. Empty iron drums, not exceeding 10 gallons capacity.
418. Engineers', boilermakers', brass-finishers', smiths', and all metal- and wood-workers'-machine and hand tools.
419. Engine governors.
420. Eyelets.
421. Fire-engines, including Merryweather's chemical fire-engines.
422. Fish-hooks.
423. Galvanising-baths, welded.
424. Gas-engines and hammers, and oil-engines.*
425. Glassmakers' moulds.
426. Hydraulic cranes.
427. Iron- and brass-wove wire and wire gauze; also wire netting.
428. Iron boiler-plates and unflanged end-plates for boilers; boiler-tubes not exceeding 6 in. in diameter, and unflanged; Bowling's expansion rings; furnace-flues.
429. Iron, plain black sheet, rod, bolt, bar, plate,* hoop, and pig.†
430. Iron rolled girders.
431. Iron plates, screws, and castings for ships.
432. Iron wire n.o.e., including fencing-wire, plain and barbed.
433. Lead, in pigs and bars.
434. Locomotives.
435. Machine saws.

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* If of foreign manufacture subject to duty, see p. 101.
† Hoop and pig-iron not affected by preferential tariff.

436. Machinery exclusively for the purpose of the manufacture of beet-root sugar.
437. Machinery for dairying purposes.
438. Machinery of every description for mining purposes, including machine pumps, but not including machinery for dredging.
439. Machinery for gold-saving purposes and processes.
440. Metal fittings for trunks, portmanteaux, travelling-bags, leggings, bags, and satchels.
441. Metal sheaves for blocks.
442. Metallic capsules.
443. Perambulators and the like vehicles, fittings for, n.o.e.
444. Perforated or cellular sheet zinc or iron.
445. Portable engines on four or any greater number of wheels, with boiler of locomotive type; also traction-engines.
446. Printing type and materials n.o.e.
447. Rails for railways and tramways.*
448. Reapers and binders, and reaping and mowing machines, and extra parts for same; materials for manufacturing agricultural machinery, namely, reaper-knife sections, fingers, brass and steel springs, malleable castings, discs for harrows, mould-boards and plough-shares, mould-board plates, and steel-share plates cut to pattern, skeith-plates; ploughs and harrows; combined threshers.
449. Riddles and sieves.
450. Rivets and washers.
451. Separators and coolers for dairying purposes.
452. Set-screws, engineers' studs, and split-pins.
453. Sewing-, knitting-, and kilting-machines.
454. Spiral springs (except sofa- and mattress-springs).
455. Steam and hydraulic pressure and vacuum gauges.
456. Steel rams, black or finished, for hydraulic cranes or jiggers.
457. Surveyors' steel bands and measuring-tapes.
458. Swords.
459. Tacks of all kinds.
460. Tea-packing lead.
461. Tin, in pigs, bars, or sheets.
462. Tinsmiths' fittings, including stamped or blocked tin, planished or unplanished.
463. Tins, tops of, ornamented.
464. Welded and flanged boiler-furnaces, plain or corrugated.
465. Wire, of brass, copper, or lead.
466. Zinc, plain sheet.
467. Zinc plates and copper plates for photo-lithographic work.

Class XIII.—Timber, etc.

468. Ash, hickory, and lancewood timber, unwrought.
469. Blacksmiths' bellows.
470. Brush woodware.
471. Carriage- and cart-shafts, spokes and felloes in the rough; hubs, of all kinds; poles if unbent and unplaned, of all kinds; bent wheel-rims.
472. Carriage- and cart-makers' materials—viz.: springs, mountings, trimmings, brass hinges, tire-bolts, shackle-holders, step treads, and other iron fittings (except steps, lamp-irons, dash-irons, seat-rails, and fifth wheels), rubber-cloth.
473. Churns.
474. Lignum-vitæ.
475. Sieves, hair.
476. Wooden handles for tools.

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* See preferential tariff, p. 101.

Class XIV.—Oils, etc.

477. Benzine in bulk.
478. Oils—viz.: candlenut, fish, kerosene, penguin, palm, seal, whale.
479. Paints and colours n.o.e.
480. Shale oil, once run, suitable for gas-making.
481. Spirits of tar.
482. Turpentine, driers, and terebene.

Class XV.—Miscellaneous.

483. Apparatus and appliances solely for teaching purposes, as may be approved by the Commissioner.
484. Bags made of New Zealand tow or flax.
485. Belting for machinery, other than leather.
486. Binder-twine.
487. Bricks, other than fire-bricks.
488. Building materials n.o.e.
489. Brushes for cream-separators and combined screens.
490. Candlenuts and candlenut kernels.
491. Candle-wick.
492. Canvas aprons and elevators for reapers and binders.
493. Carpenters' baskets.
494. Charts and maps.
495. Confectioners' moulding-starch.
496. Cotton waste.
497. Dye-stuffs and dyeing materials, crude.
498. Felt sheathing.
499. Food preservative n.o.e.
500. Gum boots.*
501. Hawsers of 12 in. and over.
502. Honey and brown Windsor soap composition.
503. Iron and steel cordage.*
504. Jute bagging, bags, and sacks.
505. Manures.
506. Marble, and other stone, hewn or rough sawn, not dressed or polished.
507. Netmakers' cotton twine.
508. Official supplies for consular officers of countries where a similar exemption exists in favour of British Consuls.
509. Papermakers' felts.
510. Passengers' baggage and effects, including only wearing-apparel and other personal effects that have been worn or are in use by persons arriving in the colony; also implements, instruments, and tools of trade, occupation, or employment of such persons; and household or other effects not exceeding £100 in value, which have been in use for twelve months prior to embarkation by the persons or families bringing them to the colony, and not intended for any other person or persons or for sale †; also cabin-furnishings belonging to such persons.
511. Plaster of Paris.
512. Powder, blasting and meal.
513. Ship-chandlery n.o.e.
514. Ships' rockets, blue-lights, and danger-signals.
515. Stones, mill- grind- oil- and whet-.
516. Tobacco for sheepwash or for insecticide, after being rendered unfit for human consumption to the satisfaction of the Commissioner.
517. Treacle or molasses, mixed with bone-black in proportions to the satisfaction of the Commissioner.
518. Tubular woven cotton-cloth in the piece, for meat wraps.
519. Type-writers.

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* If of foreign manufacture subject to duty, see p. 101.
† Including bicycles which have been in use for twelve months.

520. Wax, bottling.
521. Woolpacks and woolpockets.
522. Yarn—viz.: coir, flax, hemp.
523. Articles and materials (as may from time to time be specified by the Commissioner) which are suited only for, and are to be used solely in, the fabrication of goods within the colony. All decisions of the Commissioner in reference to articles so admitted free to be published from time to time in the *Gazette*.
524. And all articles not otherwise enumerated.

TABLE OF EXCISE DUTIES.

525. Tobacco, 1s. the lb.*
526. Cigars, cigarettes, and snuff, 1s. 6d. the lb.*
527. Beer, 3d. the gallon.
528. Articles in which spirit is a necessary ingredient, manufactured in a warehouse appointed under section 26 of "The Customs Laws Consolidation Act, 1882," namely—
    Pharmacopœia tinctures, essences, extracts, and medicinal spirits containing more than 50 per cent. of proof spirit, 9d. the lb.
    Pharmacopœia tinctures, essences, extracts, and medicinal spirits containing less than 50 per cent. of proof spirit, 3d. the lb.
    Culinary and flavouring essences, 12s. the liquid gallon, from 1st February, 1896.
    Perfumed spirit, 20s. the liquid gallon, from 1st February, 1896.
    Toilet preparations which are subject to 16s. the liquid gallon on importation, 12s. the liquid gallon.
    Toilet preparations which are subject to 25 per cent. duty on importation, 6s. the liquid gallon.

Duties imposed by His Excellency the Governor under Section 17 of "The Customs and Excise Duties Act, 1888."

529. Olive stones, ground (see *New Zealand Gazette*, 15th May, 1890), 4d. the lb.
530. Brewers' caramel (see *New Zealand Gazette*, 21st August, 1890), 3d. the lb.
531. Liquid hops (see *New Zealand Gazette*, 21st December, 1893), 6s. the lb.
532. The United Asbestos Patent Salamander Decorations (see *New Zealand Gazette*, 14th May, 1896), 15 per cent. *ad valorem*.
533. Matches of any material other than wood or wax, a duty corresponding to the duty payable on wooden matches (see *New Zealand Gazette*, 27th April, 1899).
534. Fibre conduit pipes and fittings for same (see *New Zealand Gazette*, 4th May, 1899), 5 per cent. *ad valorem*.
535. Caramel cereal (see *New Zealand Gazette*, 14th March, 1901), ½d. the lb.
536. Compo-board (see *New Zealand Gazette*, 12th December, 1901), 4s. the 100 ft. super.

The "Opium Prohibition Act, 1901," makes it unlawful for any person to import opium into the colony in any form suitable for

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* "The Tobacco Excise Duties Act, 1896," section 2, enacts:—

"On and after the thirty-first day of December, one thousand eight hundred and ninety-six, section three of 'The Customs and Excise Duties Act, 1891,' shall be deemed to be repealed, and in lieu of the duties imposed by that section there shall be levied, collected, and paid, on and after that day, upon tobacco manufactured in the colony, at the time of making the entry for home consumption thereof, the several duties of excise following, that is to say—

On tobacco	... One shilling the pound.
On cigars and snuff	... One shilling and sixpence the pound.
On cigarettes—	
If manufactured by machinery ...	... Two shillings and sixpence the pound.
If made by hand	... One shilling the pound."

smoking. Permits may be issued by the Commissioner of Trade and Customs for the importation of the drug in the following forms:—

Opium, crude.
Opium, in powder.
Opium, extract of, solid.

No permit shall be issued to any person of the Chinese race. Heavy penalties are prescribed for breaches of the above law.

"The Opium Prohibition Act Amendment Act, 1902," makes it illegal to have opium in possession, except the kinds stated above, which can be held under permit.

"The Timber Export Act, 1901," authorised the collection, by Order in Council, of the following duties:—

SCHEDULE.

Logs, round	3s. per 100 superficial feet.	Or such lesser duty as the Governor by Order in Council determines.
Logs, squared with axe or saw..		
Half logs		
Flitches of any particular kind, or pieces of such size as the Governor by Order in Council from time to time determines	3s. per 100 superficial feet	Or such lesser duty as the Governor by Order in Council determines.

An Order in Council dated the 27th March, 1902, directs that there shall be levied, collected, and paid previous to exportation from New Zealand, duties upon white pine and kahikatea timber as under:—

Logs, round	3s. per 100 superficial feet.
Logs, cut in half	" "
Logs, squared with axe or saw, 10 in. by 10 in. or its equivalent, or over	" "
Flitches, any width, and not exceeding 10 in. thick,	2s. per 100 superficial feet.

A further Order in Council, dated 10th April, 1902, directs that duties on kauri timber shall be charged as under:—

Logs, round	3s. per 100 superficial feet.
Logs, cut in half	" "
Logs, squared with axe or saw..	" "
Flitches, exceeding 30 in. in width and 9 in. in thickness	2s. per 100 superficial feet.

"The Timber Export Duty Act, 1903," forms part of and is to be read with "The Timber Export Act, 1901." The following duties may, by Order in Council,* be substituted for those in the Schedule to the last-named statute:—

SCHEDULE.

Logs, round	5s. per 100 superficial feet	Or such lesser duty as the Governor by Order in Council determines.
Logs, squared with axe or saw..		
Half logs		
Flitches of any particular kind, or pieces of such size as the Governor by Order in Council from time to time determines	3s. per 100 superficial feet	Or such lesser duty as the Governor by Order in Council determines.

* No order yet issued

"THE PREFERENTIAL AND RECIPROCAL TRADE ACT, 1903."

THE above Act forms part of and is to be read together with "The Customs Law Consolidation Act, 1882." Certain goods (enumerated in these Schedules) imported into New Zealand, not being the produce or manufacture of some part of the British dominions, are to be subject to duty or extra duties as set forth hereunder :—

ARTICLE NAMED IN FIRST SCHEDULE.

(An additional duty equal to the amount payable under any tariff for the time being in force in New Zealand.)

Cement.

ARTICLES NAMED IN SECOND SCHEDULE.

(An additional duty equal to one-half of the amount payable under any tariff for the time being in force.)

Basket- and wicker-ware, n.o.e., not being furniture.
Bicycles, tricycles, and the like vehicles; also finished or partly finished or machined parts of same, n.o.e., including weldless steel tubing cut to short lengths.
Boots, shoes, and slippers, n.o.e.; goloshes, clogs, pattens, vamps, uppers, and laces.
Candles.
Carriages, carts, drays, wagons, and perambulators, and wheels for same.
China, porcelain, and parian ware.
Clocks.
Cordage and rope, n.o.e.
Cream of tartar.
Earthenware, stoneware, and brownware.
Fancy goods and toys.
Firearms, all kinds.
Fish, potted and preserved.
Furniture and cabinetware, n.o.e., and other than iron.
Glass, crown, sheet, and common window.
Glassware; also plate-glass, and glass polished, coloured, and other kinds, n.o.e.; globes and chimneys for lamps.
Hardware, ironmongery, and holloware.
Hops.
Iron nails.
Iron pipes, and fittings for same, including main-cocks.
Lamps, lanterns, and lamp-wick.
Musical instruments—viz., pianos.
Paper-hangings.
Paper, wrapping—viz., blue candle, glazed cap, glazed casings, small hand, lumber hand, and tissue.
Paper, wrapping, other kinds, including brown, cartridge, and sugar papers.
Plate and plated-ware.
Pumps and other apparatus for raising water.

ARTICLES NAMED IN THIRD SCHEDULE.

(Duties equal to 20 per centum of the value for duty as defined by the principal Act, or by any Act amending the principal Act.)

Bicycles and tricycles, fittings for—viz., rubber tires, pneumatic tires, outside covers, and inner tubes; rubber and cork handles, and pedal-rubbers; also drop-forgings and stampings, ball-bearings, weldless steel tube in full lengths, rims, forks, and spokes in the rough.

Gas engines and hammers, and oil engines.
Gum boots.
Iron and steel cordage.
Iron, plain black sheet, rod, bolt, bar, and plate.
Printing paper.*
Rails for railways and tramways.†
Sailcloth, canvas, and unbleached double-warped duck.
Surgical and dental instruments and appliances.

The Act also provides that from and after the 31st March, 1904, no duty shall be leviable on tea grown in any part of the British dominions, except on tea in packets not exceeding one pound in weight.

[The main features of the Act, including its provisions as to reciprocity of trade, will be found described in Part III. of this volume.]

FEES PAYABLE UNDER LAND TRANSFER ACT.

FEES PAYABLE TO DISTRICT LAND REGISTRARS UNDER "THE LAND TRANSFER ACT, 1885."

	£	s.	d.
For the bringing land under the provisions of this Act (over and above the cost of advertisements)—			
When the title consists of a Crown grant, and none of the land included therein has been dealt with	0	2	0
When the title is of any other description and the value exceeds £300	1	0	0
When the title is of any other description and the value exceeds £200 and does not exceed £300	0	15	0
When the title is of any other description and the value exceeds £100 and does not exceed £200	0	10	0
When the title is of any other description and when the value does not exceed £100	0	5	0
Contribution to the Assurance Fund upon first bringing land under the Act,—			
In the pound sterling	0	0	0½
Other fees—			
For every application to bring land under the Act	0	5	0
For every certificate of title on transfer where the consideration does not exceed £100	0	10	
For every other certificate of title	1	0	
Registering memorandum of transfer, mortgage, incumbrance, or lease	0	10	0
Registering transfer or discharge of mortgage or of incumbrance, or the transfer or surrender of a lease	0	5	0
Registering proprietor of any estate or interest derived by settlement or transmission	0	10	0
For every power of attorney deposited	0	10	0

* No duty as above described is to be levied on printing papers imported by and for the use of the proprietors of any registered newspaper, if it is proved to the satisfaction of the Collector that they are imported under a valid contract for the supply of such papers for a period not exceeding three years, entered into prior to the 16th November, 1903.

† No preferential duty will be levied on rails for tramways and other goods mentioned in the above Schedules directly imported before 31st March, 1906, for use in the construction or equipment of any tramway for which plans and specifications have been completed or are in course of preparation on the passing of the Act.

Other fees—*continued.*	£	s.	d.
For every registration abstract	1	0	0
For cancelling registration abstract	0	5	0
For every revocation order	0	10	0
Noting caveat	0	10	0
Cancelling or withdrawal of caveat, and for every notice relating to any caveat	0	5	0
For every search	0	2	0
For every general search	0	5	0
For every map or plan deposited	0	5	0
For every instrument declaratory of trusts, and for every will or other instrument deposited	0	10	0
For registering recovery by proceeding in law or equity or re-entry by lessee	0	10	0
For registering vesting of lease in mortgagee, consequent on refusal of Trustee in Bankruptcy to accept the same	0	10	0
For entering notice of marriage or death	0	10	0
For entering notice of writ or order of Supreme Court	0	10	0
Taking affidavit or statutory declaration	0	5	0
For the exhibition of any deposited instrument, or for exhibiting deeds surrendered by applicant proprietor	0	5	0
For certified copy, not exceeding five folios	0	5	0
For every folio or part folio after first five	0	0	6
For every notice to produce deeds or instruments	0	5	0
For every outstanding interest noted on certificate of title	0	5	0
When any instrument purports to deal with land included in more than one grant or certificate, for each registration memorial after the first	0	2	0

Regulations.

All fees under the Act shall be due and payable in advance.

Where several properties are included in one form of application, there shall be charged in respect of each property an application fee, and a fee for bringing the land under the Act. Land included within one outer boundary shall be deemed one property for the purpose of this regulation.

In all cases a fee of one pound (£1) is hereby prescribed as the charge to be made for advertising notice of application; provided that, whenever it is necessary that unusual publicity shall be given to any application, the District Land Registrar may require payment of such additional sum as shall, in his judgment, be sufficient to defray the cost of such advertisements.

In all cases where application is made to bring land under the Act, and the certificate of title is directed to issue and is issued in the name of the applicant, the fees for bringing such land under the Act, with the exception of the "application fee," may, at the request of the applicant, remain unpaid until such land is dealt with by him as registered proprietor. The District Land Registrar shall retain any such certificate of title until the fees due upon the same have been paid, and, until such payment, shall not register any dealing with the land included in such certificate of title.

Printed forms supplied by the Registrar for use under the Act shall be charged for at the rate of one shilling each. Solicitors, land-brokers, and others having forms printed for their own use, and at their own expense, shall, on approval of such forms by the Registrar, be entitled to have the same sealed free of charge.

DUTIES ON ESTATES OF DECEASED PERSONS

By the Amendment Act of 1885 the Schedule of Duties payable under the principal Act of 1881 has been repealed, and the following imposed in lieu thereof:—

1. When the value does not exceed £100	No duty.
2. Upon any amount exceeding £100 but not exceeding £1,000—	
On the first £100	No duty.
And on the remainder	£2½ per cent.
3. Upon any amount exceeding £1,000 but not exceeding £5,000	£3½ per cent.
4. Upon any amount exceeding £5,000, but not exceeding £20,000	£7 per cent.
Upon £20,000 and any amount over that sum	£10 per cent.
Strangers in blood, excepting adopted children	£3 per cent. additional.

These duties are leviable upon the final balance of the real and personal estates.

The exemption in respect of property passing absolutely to widow at death of husband is now extended *vice versâ*.

There are also special provisions in the law affecting children, grandchildren, step-children, and adopted children inheriting property.

The above duties also apply to deeds of gift.

PART II.—STATISTICAL.

SECTION I.—POPULATION.

THE population of New Zealand, as estimated for the 31st December, 1903, with the increase for the year, is shown below :—

	Persons.	Males.	Females
Estimated population, exclusive of Maoris (also Cook and other annexed Islands), on 31st December, 1902	807,929	425,908	382,021
Increase during the year 1903 :—			
By excess of births over deaths	13,301	6,270	7,031
Excess of arrivals over departures	11,275	7,496	3,779
Estimated population (exclusive of Maoris, also Cook and other annexed Islands), on 31st December, 1903	832,505	439,674	392,831
Maori population, census, 1901	43,143	23,112	20,031
Population of Cook and other Pacific Islands ..	12,292	6,369	5,923
Total estimated population of colony (including Maoris, also Cook and other Islands) on 31st December, 1903	887,940	469,155	418,785

The number of the Chinese in New Zealand at the end of the year 1903 was estimated to be 2,762 persons, of whom 31 were females.

Details showing the distribution of the Maori population and also of the Cook and other annexed Pacific Islands follow ; but the figures in the succeeding portions of this section exclude these special features.

TOTAL NUMBER OF MAORIS IN EACH COUNTY.

[Further particulars as to sex, age, &c., will be found in the Year-book for 1903, in the section specially dealing with the Native population.]

Counties.	Persons.	Counties.	Persons
Mongonui	2,093	Ohinemuri	630
Whangaroa	743	Piako	409
Hokianga	2,330	Waikato	983
Bay of Islands	2,235	Waipa	226
Hobson	984	Raglan	1,499
Whangarei	739	Kawhia	1,649
Otamatea	186	West Taupo	1,130
Rodney	173	East Taupo	651
Waitemata	171	Rotorua	971
Eden	223	Tauranga	1,301
Great Barrier Island ..	37	Whakatane	3,170
Waiheke Island	70	Waiapu	2,474
Manukau	734	Cook	1,803
Coromandel	565	Clifton	420
Thames	774	Taranaki	1,020

Total Number of Maoris in each County—*continued.*

Counties.	Persons.	Counties.	Persons.
Stratford	43	Kaikoura	78
Hawera	853	Collingwood	22
Patea	274	Waimea	107
Waitotara and Wanganui ..	1,689	Buller	23
Rangitikei	459	Westland	60
Oroua	433	Ashley	188
Pohangina	3	Selwyn	56
Manawatu	252	Akaroa	293
Horowhenua	1,035	Levels and Geraldine ..	134
Wairoa	1,991	Waimate	65
Hawke's Bay	1,605	Waitaki	117
Waipawa	403	Waikouaiti	168
Patangata	181	Peninsula	92
Pahiatua	24	Taieri	42
Wairarapa North ..	337	Clutha	22
Wairarapa South ..	476	Southland	2
Hutt	264	Wallace	98
Sounds	263	Stewart Island	112
Marlborough	79	Chatham Islands	211

Population of Cook and other Pacific Islands recently included within the Boundaries of the Colony.

	Persons.
Rarotonga*	2,060[a]
Mangaia	1,541
Atiu*	918[b]
Aitutaki*	1,170[c]
Mauke (or Parry Island)	370
Mitiaro	165
Hervey Islands	10
Total Cook group	6,234
Niue (or Savage Island)*	4,079[d]
Palmerston*	115[e]
Penrhyn (or Tongareva)*	445[f]
Manahiki*	484[g]
Rakaanga	400
Danger (or Pukapuka)	505
Suwarrow	30
Total other Islands	6,058
Total population of annexed Pacific Islands	12,292

* Results of census taken in 1902.

(a) Birthplaces.—Rarotonga, 1,517; Mangaia, 206; Aitutaki, 58; Mauke, 16: Atiu, 37; Mitiaro, 11; Society Islands, 73; other Pacific Islands, 58; United Kingdom, 30; America, 11: New Zealand, 21; China, 7; Germany, 5: Portugal, 5; Australia, 3 Jamaica, 1; New Guinea, 1.

(b) Birthplaces.—Atiu, 913; Rarotonga, 3; Austria, 1; China, 1.

(c) Not including 149 natives absent in ships or at the guano islands,

(d) Whites and half-castes living as whites, 28 persons; absent in ships or at Tonga, 418 persons.

(e) Birthplaces.—Palmerston atoll, 100; Manahiki, 10; Penrhyn, 3; Pukapuka, 1; Society Islands, 1.

(f) Birthplaces.—Penrhyn, 342; Cook Islands, 25; Society Islands, 64; Arorai, 2; United Kingdom, 8; other places, 4.

(g) Birthplaces.—Manahiki, 469; Pukapuka, 11; Society Islands, 2; England, 2.

Increase of Population (exclusive of Maoris and Annexed Pacific Islands).

The increase for each quarter of the year 1903 was :—

Increase from:	Total.	Males.	Females.
First Quarter.			
Excess of births over deaths	3,107	1,472	1,635
Excess of arrivals over departures	3,814	3,111	703
	6,921	4,583	2,338
Second Quarter.			
Excess of births over deaths	3,198	1,512	1,686
Excess of arrivals over departures	796	585	211
	3,994	2,097	1,897
Third Quarter.			
Excess of births over deaths	3,189	1,464	1,725
Excess of arrivals over departures	1,466	785	681
	4,655	2,249	2,406
Fourth Quarter.			
Excess of births over deaths	3,807	1,822	1,985
Excess of arrivals over departures	5,199	3,015	2,184
	9,006	4,837	4,169
Year 1903.			
Excess of births over deaths	13,301	6,270	7,031
Excess of arrivals over departures	11,275	7,496	3,779
	24,576	13,766	10,810

As to the increase of arrivals over departures, it will be seen that the December quarter is by far the largest proportion of the four (5,199 persons). The March quarter comes next with 3,814 persons, while the June and September quarters yield but small numbers. The increase by births over deaths is also greatest in the December quarter, the numbers for the others being nearly equal.

The movement of population since 1885 is given in the next table. Although the large increase in 1893 by excess of arrivals over departures was not maintained during the nine following years, the arrivals in the colony nevertheless exceeded the departures in each of these years, and the total excess of arrivals for the twelve-year period 1892–1903 inclusive is found to be 54,945 persons, drawn from other colonies or countries.

The excess of arrivals in the colony during the year 1903 over the departures will be seen from the table to have been greater than that shown for 1902. For 1901, the figures are 6,522; for 1902, 7,992; while for 1903, the number is 11,275. Comparing these results with those for 1900, when the excess of arrivals was only 1,831, it shows an annual progressively increasing population coming from abroad.

In three years New Zealand has drawn 25,789 persons, mostly from Australia and the Home country, after deducting from the total arrivals all those who departed outwards.

So far as can be ascertained the United Kingdom only furnished 5,144 of the above large number added to New Zealand for the three years, while Australia shows as contributing 21,510, partly in consequence of the great depression on account of the drought. But the full number from the United Kingdom is not ascertainable, and Australia is credited with more than the actual fact. The figures for other places show a loss to New Zealand of 865 persons.

Year.	Estimated Population on the 31st December.	Increase during the Year			Centesimal Increase on Population of Previous Year.
		By Excess of Births over Deaths.	By Excess of Arrivals over Departures.*	Net Increase.	
1885	575,172	13,612	−2,744†	10,868	1·93
1886	589,386	13,164			
1887	603,361	12,998			
1888	607,380	13,194			
1889	616,052	12,685	−17,194†	58,886	10·24
1890	625,508	12,284			
1891	634,058	11,755			
1892	650,433	11,417	4,958	16,375	2·58
1893	672,265	11,420	10,412	21,832	3·36
1894	686,128	11,610	2,253	13,863	2·06
1895	698,706	11,683	895	12,578	1·83
1896	714,162	12,180	1,472	13,652	1·95
1897	729,056	12,142	2,752	14,894	2·09
1898	743,463	11,711	2,696	14,407	1·98
1899	756,505	11,155	1,887	13,042	1·75
1900	768,278	12,346	1,831	14,177	1·87
1901	787,657	12,857	6,522	19,379	2·52
1902	807,929	12,280	7,992	20,272	2·57
1903	832,505	13,301	11,275	24,576	3·04

*Corrected where necessary in accordance with census results. The amount of loss by departures in the period 1886–91, though correct in the aggregate, cannot be allocated with exactness to the respective years. †Loss.

The net gain to this country for 1903 appears as 1,756 persons from United Kingdom, and 9,949 from Australia, while 430 represents the net loss to other places. But here again the gain from Australia is given somewhat too high, and that from the Home country too low.

Still, to absorb the greater part of ten thousand persons from Australia in one year, no matter from what causes—prosperity here and reverses there—is an excellent result, not nearly approached in any previous year since 1893, the time of financial panic on the Continent, when New Zealand took 9,074 persons by way of net gain.

Arrivals and Departures during 1903.

The number of persons who arrived in the colony in the year 1903 was 30,883, an increase of 590 on the number for the previous year. Of the arrivals in 1903, 27,231 persons were classified as adults, being above the age of twelve years, and 3,652 as children. The total number of males was 20,479 and of females 10,404. The arrivals from the United Kingdom numbered 3,547, and from Australia 25,888. Besides these, 476 persons came from Fiji, and 972 from the South Seas and other ports, including arrivals by mail-steamers from San Francisco.

Classified in respect of birthplace, it is found that 8,161 of the arrivals were persons born in Australasia, 21,105 in the United Kingdom, and 33 in other British possessions. Of 1,584 persons born in foreign countries who arrived during 1903, 190 were born in Germany, 516 in Austria, 143 in France, 221 in the United States, 75 in Denmark, 60 in Sweden, 51 in Norway, 20 in Greece, 82 in Italy, 20 in Switzerland, 24 in Russia, 3 in Belgium, 3 in Spain, and 176 in other countries (China, Japan, Pacific Islands, Syria, and Asia Minor).

Among the arrivals in 1903 are noticed 166 "race-aliens," or persons of other than European descent. Particulars of birthplace and sex are as under:—

Birthplace.	M.	F.	Total.
Asia Minor	7	1	8
China	132	0	132
Syria	7	5	12
Turkey	3	0	3
Fiji	1	0	1
India	1	0	1
Japan	8	0	
United States	1	0	1
Total	160	6	166

The practice of nominating immigrants to be brought out partly at the Government expense has been discontinued since the 16th December, 1890, and there was no free immigration in the year 1903. Certain reductions in fares are, however, arranged by the

Agent-General with the shipping companies for men with moderate means who intend to take up land and settle in the colony, and the sum of £4,000 was voted by Parliament in 1903 for assistance by way of reduced fares for passages of intending settlers to the colony.

One hundred and thirty-two Chinese (all men) arrived in the colony during 1903, and 124 (all men) left, the arrivals thus exceeding the departures by 8.

The total departures in 1903 were 19,608 persons, being 2,693 less than in 1901. Thus, the movement of population to the colony is found to have been greater, and that from the colony less, than in the previous year.

The departures from the colony by the Union Steamship Company's boats, as given through the Customs Department, are checked by special returns kindly furnished by the pursers of the steamers, and, where persons who did not book their passages have been omitted, the necessary additions are made. The pursers' returns also serve to prevent the occasional omission of the full number of persons leaving by any one vessel, which sometimes had happened previous to the introduction of this check. Unless more passengers are at any time of great pressure taken away from New Zealand than can lawfully be carried, the returns of outgo of population should prove fairly correct, and indeed the last census shows that the estimated population even after five years' interval was a very close approximation to the truth.

Of the departures in 1903, 18,089 persons were over twelve years of age, and 1,519 children. Nearly twice as many males left the colony as females, the numbers being 12,983 and 6,625 respectively. The departures to the United Kingdom amounted to 1,791 persons, and those to Australia numbered 15,939. Besides these, 524 persons left for Fiji, and 1,354 for other ports (including passengers for San Francisco).

In 1891 the colony lost population by excess of departures over arrivals, but in each of the years 1892 to 1903, inclusive, New Zealand has drawn to itself more population than it has parted with.

Census, 1901.

The population of the colony (exclusive of Maoris), as returned in the census schedules for the night of the 31st March, 1901, was 772,719 persons, of whom 2,857 were Chinese, and 2,407 half-castes living amongst and as Europeans.

A census of the Maori population was taken during February of 1901, when, according to returns made by the enumerators, the number of the Native race was found to be 43,143 persons, including 3,133 half-castes living as Maoris. 196 Maori women were returned as married to European husbands. The complete population (European and Maori) of the colony was therefore 815,862 persons, as exhibited in the following statement, specifying the numbers for each sex :—

Population (exclusive of persons of the aboriginal native race, of mixed European and Native blood, and Chinese)	Persons.	Males.	Females.
	767,455	401,979	365,476
Half-castes and persons of mixed race living as and among Europeans	2,407	1,188	1,219
Chinese	2,857	2,825	32
Aboriginal natives (including 196 Maori wives of Europeans)	40,010	21,418	18,592
Half-castes and persons of mixed race living among and as members of Maori tribes	3,133	1,694	1,439
Total population on 31st March, 1901	*815,862	429,104	386,758

* Not including 352 persons, officers and crews of two British men-of-war.

The total half-caste or mixed European and Native population was 5,540 persons. The number of half-castes living among Europeans increased since 1896 by 148, or at the rate of 6·55 per cent. In that year the number of Maori wives of Europeans was 229; in 1901 it was 196. The Chinese decreased from 3,711 at the time of the census of 1896 to 2,857 in March, 1901; or at the rate of 23·01 per cent., caused mainly by the excess of departures over arrivals.

The Maori population fell from 41,993 in 1891 to 39,854 in 189 and increased to 43,143 in 1901, according to the returns.

The increase on the total European population between April, 1896, and 31st March, 1901, amounted to 69,359 persons, or a rate of 9·86 per cent. Between the census of 1891 and that of 1896 the numerical increase was 76,702 persons, or 12·24 per cent. The average annual increase in the period 1896–1901 was at the rate of 1·90 per cent.

The population of the principal divisions of the colony on 31st March, 1901, was—

	Persons.	Males.	Females.
North Island and adjacent islets (exclusive of Maoris)	390,571	206,606	183,965
Middle Island and adjacent islets (exclusive of Maoris)	381,661	199,103	182,558
Stewart Island	272	166	106
Chatham Islands (exclusive of Maoris)	207	112	95
Kermadec Islands	8	5	3
Total for the colony (exclusive of Maoris)	772,719	405,992	366,727

Proportion of the Sexes and Density of Population.

The gradual equalization of the numbers of the sexes and growing density of population and dwellings in the colony are alluded to in a further table.

Date of Enumeration.	Number of Females to 100 Males.	Number of Persons to a Square Mile.	Number of Persons to an Inhabited Dwelling.	Number of Inhabited Dwellings to a Square Mile.
December, 1861	62·16	0·944	4·42	0·214
February, 1871	70·52	2·456	4·48	0·548
April, 1881	81·72	4·693	5·12	0·917
April, 1891	88·26	6·024	5·06	1·191
March, 1901	90·33	7·427	4·86	1·527

Increase of Population at Successive Censuses.

The increase of population of European descent at successive census periods has been :—

Date of Enumeration.	Population. Persons.	Numerical Increase. Persons.	Centesimal Increase.
December, 1858 ..	59,413		
		39,608	39·99
„ 1861 ..	99,021		
		73,137	73·86
„ 1864 ..	172,158		
		46,510	27·01
„ 1867 ..	218,668		
		37,725	17·25
February, 1871 ..	256,393		
		43,121	16·82
March, 1874 ..	299,514		
		114,898	38·36
„ 1878 ..	414,412		
		75,521	18·22
April, 1881 ..	489,933		
		88,549	18·07
March, 1886 ..	578,482		
		48,176	8·33
April, 1891 ..	626,658		
		76,702	12·24
„ 1896 ..	703,360		
		69,359	9·86
March, 1901 ..	772,719		

Populations of Provincial Districts.

These are stated as in March, 1901, and at the previous census. Taranaki stands first for rate of progress with an increase of 21·42 per cent. in five years, Wellington comes next with 16 per cent., Auckland third with 14·57, Marlborough and Nelson have increased from 6 to 7 per cent., Canterbury and Otago somewhat over 5 per cent.

Provincial Districts.	Population, April, 1896.	Population, March, 1901.	Increase.	
			Numerical.	Centesimal.
	Persons.	Persons.	Persons.	
Auckland	153,564	175,938	22,374	14·57
Taranaki	31,175	37,855	6,680	21·42
Hawke's Bay ..	34,038	35,424	1,386	4·07
Wellington ..	121,854	141,354	19,500	16·00
Marlborough ..	12,483	13,326	843	6·75
Nelson	35,734	37,915	2,181	6·10
Westland	14,469	14,506	37	0·26
Canterbury ..	135,858	143,041	7,183	5·29
Otago	163,944	173,145	9,201	5·61
Chatham Islands	234	207	−27	−11·54
Kermadec Islands	7	8	1	14·28
Totals ..	703,360	772,719	69,359	9·86

(−) Decrease.

Population of Counties and Boroughs.

New Zealand is, by "The Counties Act, 1876," divided into counties and boroughs, excepting certain outlying islands, which are not within county boundaries. It is provided by the above-mentioned Act that boroughs shall not be included in counties. In March, 1901, the number of the counties was 86. Of these, the North Island had 52, with a population amounting altogether to 216,725 persons. The Middle Island had 33 counties, the population being 200,618 persons. Stewart Island is a county in itself, and had a population of 253 persons, exclusive of persons on shipboard. The names and populations of the various counties in the colony, with their interior boroughs set opposite, were as under at the date of the enumeration :—

Counties.	Census, 1901.	Boroughs.	Census, 1901.
Mongonui	2,274		
On shipboard	18		
Whangaroa	927		
Hokianga	1,767		
On shipboard	22		
Bay of Islands	2,587		
On shipboard	26		
Hobson	4,813		
On shipboard	163		
Whangarei	6,380	Whangarei	1,429
On shipboard	31		
Otamatea	2,721		
Rodney	3,678		
On shipboard	17		
Waitemata	7,035	Birkenhead	1,057
On shipboard	27	Devonport	3,823
		On shipboard	1
Eden	19,314	Grey Lynn	4,110
		Auckland	34,213
		On shipboard	874
		Parnell	4,566
		Newmarket	2,060
		Onehunga	3,015
		On shipboard	47
Manukau	12,306		
Coromandel	4,169		
On shipboard	14		
Thames	5,043	Thames	4,009
On shipboard	8	On shipboard	11
*Ohinemuri	9,978		
On shipboard	50		
Piako	2,436	Te Aroha	888
Waikato	3,183	Hamilton	1,253
Waipa	3,580	Cambridge	989
Raglan	1,697		
†Kawhia	1,113		
On shipboard	1		
West Taupo	287		
East Taupo	256		
Rotorua	1,307		
Tauranga	1,720	Tauranga	945
		On shipboard	1
Whakatane	779		
Opotiki	1,438		
On shipboard	5		
Waiapu	711		
Cook	6,393	Gisborne	2,737
		On shipboard	58
Wairoa	1,773		
Hawke's Bay	6,833	Napier	8,774
		On shipboard	241
		Hastings	3,650

* Since reduced by creation of Waihi Borough. † Since reduced by creation of Awakino County.

Counties.	Census, 1901.
Clifton	2,535
*Taranaki	11,194
On shipboard	92
Stratford	5,081
*Hawera	8,347
Patea	3,046
Waitotara	3,476
Wanganui	4,018
Rangitikei	7,570
Kiwitea	2,844
†Oroua	6,778
Pohangina	1,536
Manawatu	3,000
Horowhenua	4,654
‡Waipawa	9,495
Patangata	2,376
Pahiatua	3,600
§Akitio	1,048
§Castlepoint	457
§Eketahuna	2,332
§Mauriceville	1,127
§Masterton	3,123
‖South Wairarapa	5,419
Hutt	7,171
Sounds	946
On shipboard	2
Marlborough	6,518
Kaikoura	1,765
¶Collingwood	2,490
On shipboard	23
Waimea	7,833
On shipboard	3
Buller	4,868
On shipboard	4
Inangahua	4,595
Grey	4,971
Westland	4,405
Amuri	1,142
Cheviot	1,120
§Ashley	11,599
§Selwyn	30,787

Boroughs.	Census, 1901.
New Plymouth...	4,405
Stratford	2,027
Hawera	2,131
Patea	691
Wanganui	7,329
On shipboard	5
Marton	1,101
Feilding...	2,298
Palmerston North	6,534
Foxton	1,211
Dannevirke	2,315
Woodville	926
Pahiatua	1,209
Masterton	3,949
Carterton	1,205
Greytown	1,122
Wellington	43,638
On shipboard	332
Onslow	1,499
**Melrose	2,995
Petone	3,780
Lower Hutt	1,823
Karori	1,212
Blenheim	3,222
Picton	875
On shipboard	95
Motueka...	886
Richmond	543
Nelson	7,010
On shipboard	157
Westport	2,922
On shipboard...	236
Brunner	1,572
Greymouth	3,748
On shipboard	89
Hokitika...	1,946
On shipboard...	5
Kumara	1,121
Ross	614
Kaiapoi	1,795
Rangiora	1,768
Lyttelton	4,023
On shipboard	321
Christchurch...	17,538
New Brighton	1,008
††Sydenham	11,404
††St. Albans	6,607
††Linwood	6,737
Woolston	2,532
Sumner	844

* Since reduced by creation of Egmont County, and Inglewood and Eltham Boroughs. † Since reduced by creation of Kairanga County. ‡ Since reduced by creation of Woodville County. § Boundaries since altered. ‖ Since reduced by creation of Featherston County. ¶ Since reduced by creation of Takaka County. ** Since merged in Wellington. †† Since merged in Christchurch.

Counties.	Census, 1901.	Boroughs.	Census, 1901.
*Akaroa	3,669	Akaroa	559
		On shipboard	5
Ashburton	11,342	Ashburton	2,322
Geraldine	5,991	Temuka...	1,465
Levels	5,496	Timaru	6,424
		On shipboard	62
Mackenzie	1,642		
Waimate	5,653	Waimate	1,359
Waitaki...	9,086	Oamaru	4,836
		On shipboard	17
		Hampden	331
Waihemo	2,014	Palmerston South	738
Waikouaiti	4,082	Hawksbury	690
		Port Chalmers	2,056
		On shipboard...	149
		North-east Valley	3,527
		Maori Hill	1,550
		West Harbour	1,465
Peninsula	2,561		
Taieri	7,179	Dunedin	24,879
		On shipboard	228
		Roslyn	4,632
		Mornington	4,008
		Caversham	5,266
		St. Kilda	1,700
		South Dunedin	5,363
		Green Island	667
		Mosgiel	1,463
Bruce	4,762	Milton	1,241
		Kaitangata	1,463
Tuapeka	6,272	Lawrence	1,159
		Roxburgh	478
		Tapanui	350
†Clutha	6,445	Balclutha	1,017
Maniototo	3,792	Naseby	505
Vincent	4,362	Cromwell	642
		Alexandra	818
Lake	2,535	Arrowtown	410
		Queenstown	690
†Southland	22,583	Gore	2,354
		Mataura	867
		Winton	474
		Invercargill	6,215
		Invercargill North	925
		Invercargill South	1,874
		Invercargill East	939
		Avenal	355
		Gladstone	329
		Campbelltown	1,350
		On shipboard	303
Wallace	7,989	Riverton	815
Fiord	124		
Stewart Island	253		
On shipboard	19		

* Since reduced by creation of Mount Herbert County. † Boundaries since altered.
[Chatham Islands, with a population of 207 at time of census of 1901, has since been created a county.]

The total county population amounted to 417,596, or 54·04 per cent. of the total for the colony. In counties are included all towns not constituted municipal boroughs; but, on the other hand, the people living in many of the boroughs can hardly be called town population. The population in boroughs was 350,202 persons, or 45·32 per cent. of the whole. For every 100 persons resident in counties in 1901 there were 84 residing in boroughs.

In 1896 the counties had 391,735 persons, and the boroughs 307,294, or, in other words, for every 100 persons in counties, 78 were residents of the boroughs. Thus it will be seen that the proportion of the town to the county population was greater in 1901 than in 1896.

Chief Cities and Suburbs.

The Cities of Auckland, Christchurch, and Dunedin have considerable suburbs. The suburban population of Wellington is comparatively small. The following gives the names and populations of the several localities which may fairly be termed suburbs of the four principal cities:—

Suburbs of Auckland.

Boroughs—	Population, Census, 1901.
Birkenhead	1,057
Devonport	3,823
Newmarket	2,060
Grey Lynn (Newton)	4,110
Parnell	4,566
Road Districts—	
Arch-hill	1,671
Eden Terrace	2,011
Epsom	750
Mount Albert	2,085
Mount Eden	5,129
Mount Roskill	581
One-tree Hill	1,283
Point Chevalier	684
Remuera	2,186
Northcote Riding	767
Outlying portion of Parnell Riding, being land in the Domain with hospital on it	250
Total suburbs	33,013
Auckland City	34,213
Total Auckland and suburbs	67,226

Suburbs of Wellington.

Boroughs—	
Onslow	1,499
*Melrose	2,995
Karori	1,212
Total suburbs	5,706
Wellington City	43,638
Total Wellington and suburbs	49,344

* Since merged in Wellington.

Suburbs of Christchurch.

Boroughs—	Population, Census, 1901.
†Sydenham	11,404
†St. Albans	6,607
†Linwood	6,737
New Brighton	1,008
Woolston	2,532
Road Districts—	
Spreydon	1,457
Halswell (part)	156
Riccarton (part)	4,371
Avon (part)	2,843
Heathcote (part)	2,388
Total suburbs	39,503
Christchurch City	17,538
Total Christchurch and suburbs	57,041

In laying off the suburbs of Christchurch the boundaries of the Christchurch Health District have been mainly followed.

Suburbs of Dunedin.

Boroughs—	
Caversham	5,266
Maori Hill	1,550
Mornington	4,008
North-East Valley	3,527
Roslyn	4,632
St. Kilda	1,700
South Dunedin	5,363
West Harbour	1,465
Total suburbs	27,511
Dunedin City	24,879
Total Dunedin and suburbs	52,390

† Since merged in Christchurch.

The increase of population for ten years at the four chief centres, with their suburbs, was:—

	Census, 1891.	Census, 1901.	Numerical Increase.	Increase per Cent.
Auckland and suburbs ..	51,287	67,226	15,939	31·08
Wellington and suburbs ..	34,190	49,344	15,154	44·32
Christchurch and suburbs ..	47,846	57,041	9,195	19·22
Dunedin and suburbs ..	45,869	52,390	6,521	14·22

Thus the two principal cities of the North Island are found to have progressed between 1891 and 1901 at a greater rate than those of the Middle Island, and Wellington in particular to have developed at more than three times the rate of Dunedin, and more than twice as fast as Christchurch.

While New South Wales and Victoria present what is termed by the statistician of the former State "the disquieting spectacle of capital towns growing with wonderful rapidity, and embracing in their limits one-third of the population of the territory of which they are the centre," New Zealand is saved from this by the configuration of the country, which has resulted in the formation of four chief towns, besides others of secondary importance but nevertheless trading centres of considerable consequence.

Population of Town Districts and Small Centres.

Besides the boroughs, there were 35 town districts (including the special town district of Rotorua, constituted under "The Thermal-Springs Districts Act, 1881,") which are portions of the counties in which they are situated. One only of these, Hampstead, has more than 1,000 inhabitants. A list of these town districts is subjoined, with populations, as in 1901:—

Town Districts.	Population.	Town Districts.	Population.
Kamo	260	Taradale	763
Helensville	531	Ormondville	459
Papakura	286	Waipawa	669
Te Awamutu	355	Kaikora North	268
Kihikihi	222	Featherston	629
Ngaruawahia	245	Johnsonville	502
Rotorua*	914	Havelock	316
Opotiki	627	Amberley	417
Waitara (Raleigh)	765	Southbridge	396
Opunake	466	Hampstead	1,118
Inglewood†	719	Tinwald	561
Normanby	370	Geraldine	868
Manaia	447	Allanton (formerly Grey) ..	227
Waverley	416	Outram	420
Lethbridge	230	Clinton	431
Bulls	501	Wyndham	417
Halcombe	336	Otautau	443
Clyde (Wairoa)	623		

* Constituted under "The Thermal-Springs Districts Act, 1881." † Now a municipal borough.

In addition to the boroughs and town districts above referred to, the census results showed for 1901 throughout the colony no less than 683 places of the nature of townships, villages, or small centres without boundaries, the populations of which are given in the previous Year-book.

Population of Adjacent Islands.

The names and populations of the islands adjacent to and included in the colony were, in March, 1901:—

Islands.	Total.	M.	F.
Mokohinau Lighthouse	8	5	3
Tiritiri Lighthouse	5	2	3
Motuhora	7	4	3
Great Barrier	510	357	153
Little Barrier	11	1	10
Kawau	21	7	14
Ponui	27	11	16
Ponui Lighthouse	2	1	1
Ruthe's	15	9	6
Pakatoa	5	3	2
Pahiki	4	3	1
Waiheke	162	81	81
Week's (Puketutu)	6	3	3
Motuihi	11	9	2
Bean Rock Lighthouse	1	1	...
Motutapu	11	7	4
Rakino	4	2	2
Rangitoto	3	3	..
Brown's	8	4	4
Mercury	14	5	9
Cuvier and Lighthouse	7	4	3
Slipper	3	3	..
Motiti	2	2	..
East Island Lighthouse	6	5	1
Portland and Lighthouse	21	13	8
Kapiti	3	1	2
Somes and Lighthouse	7	5	2
Stephen's	18	9	9
Brothers Lighthouse	3	3	..
Quarantine	2	1	1
Ruapuke	9	9	..
Dog Island and Lighthouse	16	9	7
Centre and Lighthouse	9	5	4
Resolution	2	2	..
Chatham Islands*	207	112	95
Kermadec Islands	8	5	3
Total	1,158	706	452

* Now a county.

The islands which are not included within the boundaries of the counties had in 1901 a population of 1,158 persons (exclusive of Maoris), against 950 in 1896. Only three of the islands had a population over 100 persons at last census. The population of the Great Barrier increased since 1896 from 307 to 510 persons; Waiheke showed a decrease from 166 to 162 persons. Europeans at the Chatham Islands decreased from 234 to 207.

Population of Australasia.

The growth of population in Australasia over a period of forty years is shown in a comparative table. The total for March, 1901, being 4,557,323 persons, is greater than the population of Ireland or Scotland for 1900, and one-seventh part of the population of England and Wales for that year. Australasia has now twice the population of Denmark, over one-third more than Switzerland, and nearly that of the Netherlands.

	Persons. 1860.	Persons. 1870.	Persons. 1880.	Persons, 1890.	Census, March, 1901.
New South Wales ..	348,546	498,659	747,950	1,121,860	1,362,200
Victoria	537,847	726,599	860,067	1,133,266	1,201,506
Queensland ..	28,056	115,567	226,077	392,965	503,266
South Australia ..	124,112	183,797	267,573	319,414	362,604
Western Australia ..	15,227	25,084	29,019	46,290	182,553
Tasmania	87,775	100,765	114,762	145,290	172,475
New Zealand ..	79,711	248,400	484,864	625,508	772,719
Australasia ..	1,221,274	1,898,871	2,730,312	3,784,593	4,557,323

Religion.

Of the various religious denominations, the Church of England has most adherents in this colony. They numbered 314,024 at the date of the census; or, including 1,239 Protestants not more specifically described, 315,263 persons, being 40·84 out of every 100 of population. The Presbyterians numbered 176,503 persons, or 22·87 per cent., and the Roman Catholics came next with 108,960, or, including Catholics not further defined, 109,822, which gives a proportion of 14·23 per cent. The Methodists were 83,802, or 10·86 in every 100 persons. Of other denominations, the Baptists, of whom there were 16,035, and the Salvation Army, 7,999 persons, were those returning more than 1 per cent. of the total population, the proportions being 2·08 and 1·04 respectively. 18,295 persons objected to state their religious belief, or 2·38 in every 100.

The numbers and percentages for five censuses are given in tabular form, so as to allow of the degree of increase relatively to the population being observed :—

Denominations.	Number of Adherents in 1901.	Proportion per Cent. of Population.				
		1881.	1886.	1891.	1896.	1901.
Church of England and Protestants (undefined) ..	315,263	41·50	40·17	40·51	40·27	40 84
Presbyterians	176,503	23·08	22·59	22·62	22 78	22·87
Methodists	83,802	9·53	9·55	10·14	10·44	10·86
Baptists	16,035	2 34	2·48	2·37	2·28	2·08
Congregationalists	6,699	1·37	1·35	1·07	0·97	0 87
Lutherans	4,833	1·18	1·02	0·90	0·79	0·63
Salvation Army	7,999	..	0 91	1·50	1·50	1·04
Society of Friends	313	0·05	0 05	0·05	0·05	0·04
Unitarians	468	0·10	0·08	0·05	0 05	0·06
Other Protestants	16,877	1·26	1·55	1·82	2·16	2·19
Roman Catholics and Catholics (undefined)	109,822	14·08	13·94	13·96	14·07	14·23
Greek Church	189	0·01	0·01	0·01	0·02	0·02
Hebrews	1,611	0·31	0·27	0·23	0·22	0·21
Buddhists, Confucians ..	2,432	1·01	0·77	0·63	0·48	0·30
Other Denominations ..	1,347	0·11	0·10	0·12	0·16	0·17
No Denomination	8,240	0·89	1·05	1·32	1·22	1·07
No Religion	1,109	0·06	0·17	0·25	0·27	0·14
Unspecified	882	0·27	0·50	*	*	*
Object to state	18,295	2·85	3·44	2·45	2·27	2·38
	772,719	100·00	100·00	100·00	100·00	100·00

* "Unspecified" not taken into account.

Birthplaces.

A table is given with full details as to birthplace, and under the head of "Allegiance" the number of British and foreign subjects in New Zealand :—

Numbers of each Nationality, and Increase, 1896 to 1901.

Where born.	Census, 1901.			Census, 1896.	Increase or Decrease.	
	Persons.	Males.	Females.	Persons.	Numerical.	Centesimal.
Total population ..	772,719	405,992	366,727	703,360	69,359	9·86
Total for specified birthplaces	772,277	405,690	366,587	702,756	69,521	9·89
British :—						
United Kingdom,—						
England	111,964	64,216	47,748	116,541	−4,577	−3·93
Wales	1,765	1,076	689	2,148	−383	−17·83
Scotland	47,858	27,516	20,342	50,435	−2,577	−5·11
Ireland	43,524	23,430	20,094	46,037	−2,513	−5·46
Australasia and Fiji,—						
New Zealand ..	516,106	257,828	258,278	441,661	74,445	16·86
Queensland	1,271	645	626	930	341	36·36
New South Wales ..	6,430	3,395	3,035	4,536	1,894	41·75
Victoria	12,583	6,530	6,053	10,471	2,112	20·17
South Australia ..	1,575	807	768	1,222	353	28·88
Western Australia ..	190	103	87	112	78	69·64

Note.—The minus sign (−) indicates decrease.

NUMBERS OF EACH NATIONALITY, AND INCREASE, 1896 TO 1901—*continued*.

Where born.	Census, 1901. Persons.	Census, 1901. Males.	Census, 1901. Females.	Census, 1896. Persons.	Increase or Decrease. Numerical.	Increase or Decrease. Centesimal.
Australia and Fiji—*contd.*						
Tasmania	3,720	2,084	1,636	3,160	560	17·72
Australia (State not named)	1,222	669	553	1,200	22	1·83
Fiji	224	98	126	151	73	48·34
Other British Possessions,—						
Gibraltar	48	24	24	49	−1	−2·04
Malta	55	37	18	71	−16	−22·54
India and Ceylon ..	1,286	722	564	1,341	−55	−4·10
Cape of Good Hope ..	141	72	69	246	−105	−42·68
St. Helena	43	25	18	50	−7	−14·00
British North America (Canada)	1,544	947	597	1,412	132	9·35
West Indies ..	208	144	64	247	−39	−15·79
Others	724	408	316	334	390	116·76
Foreign:—						
Austria Hungary ..	1,874	1,713	161	881	993	112·71
Belgium	117	84	33	138	−21	−15·22
Denmark and Possessions	2,120	1,384	736	2,125	−5	−0·24
France and Possessions	609	409	200	698	−89	−12·75
Germany	4,217	2,743	1,474	4,595	−378	−8·23
Greece	123	94	29	127	−4	−3·15
Italy	428	355	73	423	5	1·18
Netherlands and Possessions	116	105	11	132	−16	−12·12
Poland	97	65	32	101	−4	−3·96
Portugal and Possessions	172	151	21	173	−1	−0·58
Russia and Possessions	387	339	48	365	22	6·03
Spain and Possessions..	59	41	18	88	−29	−32·95
Sweden	1,548	1,337	211	1,514	34	2·25
Norway	1,279	931	348	1,261	18	1·43
Switzerland	333	251	82	342	−9	−2·63
Other European Countries	30	20	10	30	..	..
China	2,902	2,866	36	3,719	−817	−21·97
Africa	103	54	49	134	−31	−23·13
America. North America	776	501	275	969	−193	−19·92
United States of America	881	592	289	780	101	12·95
Other Foreign Countries	422	289	133	485	−63	−12·99
At sea	1,203	590	613	1,322	−119	−9·00
Unspecified	442	302	140	604	−162	−26·82
Allegiance.						
British subjects ..	761,104	396,052	365,052	690,003	71,101	10·30
Foreign subjects ..	11,615	9,940	1,675	13,357	−1,742	−13·04

NOTE.—The minus sign (−) indicates decrease.

DEAF AND DUMB.

There were 226 persons—134 males and 92 females—returned as deaf and dumb, or dumb only: of these 45 were inmates of the Sumner Institution, leaving 181 deaf-mutes who were living at home or in some other private residence. The total shows a proportion of 2·91 persons per 10,000 living, against 2·86 ascertained in 1896. The proportions of the deaf and dumb taken according to the sexes did not differ much. The figures are given for six census years.

DEAF AND DUMB (IN SEXES).—PROPORTIONS PER 10,000 OF POPULATION.

	Males	Females.		Males.	Females.
Census 1878 ..	2·25	2·18	Census 1891 ..	2·80	2·49
„ 1881 ..	2·23	2·45	„ 1896 ..	2·99	2·71
„ 1886 ..	2·37	2·22	„ 1901 ..	3·28	2·51

The numbers at the census of 1901 for quinquennial age-periods are :—

NUMBERS OF THE DEAF AND DUMB AT LAST CENSUS.

	M.	F.		M.	F.
All ages	134	92	40 years to 45 years ..	5	5
			45 „ 50 „ ..	6	1
Under 5 years	..	..	50 „ 55 „ ..	3	5
5 years to 10 years ..	18	16	55 „ 60 „ ..	5	1
10 „ 15 „ ..	32	14	60 „ 65 „ ..	3	1
15 „ 20 „ ..	18	10	65 „ 70 „ ..	..	1
20 „ 25 „ ..	16	8	70 „ 75 „ ..	..	..
25 „ 30 „ ..	8	12	75 „ 80 ..	1	2
30 „ 35 „ ..	12	8	80 „ and upwards ..	..	..
35 „ 40 „ ..	6	8	Unspecified	1	..

The highest numbers are shown at the ages 10 to 15.

The occupations (past or present) of the deaf and dumb were returned in 1901 as under :—

OCCUPATIONS (PAST OR PRESENT) OF THE DEAF AND DUMB.

	Persons.	M.		F.			Persons.	M.		F.	
		Under 20.	Over 20.	Under 20.	Over 20.			Under 20.	Over 20.	Under 20.	Over 20.
Draughtsman ..	1	..	1	..	..	Sheep-farmer ..	1	..	1	..	..
Hotel servant ..	1	..	1	..	..	Shepherd ..	1	..	1	..	..
Domestic servant	4	1	..	..	3	Dairy-farmer ..	4	..	4	..	..
Charwoman ..	1	..	..	..	1	Of independent means ..	2	..	2	..	..
Milkman ..	1	..	1	..	..	No occupation ..	8	..	8	..	..
Storekeeper's assistant ..	1	..	1	..	..	Domestic duties	38	..	..	1	37
Printer's assistant	1	1	..	..	..	Scholar, private school ..	2	1	..	1	..
Saddler ..	2	..	2	..	..	Scholar, government school ..	8	6	..	2	..
Tanner ..	1	..	1	..	..	Receiving tuition at home ..	3	2	..	1	..
Cabinetmaker ..	1	1	..	..	..	Dependent on relatives ..	41	20	5	11	5
Tailor	2	..	2	..	..	Inmate of deaf and dumb institution ..	45	24	1	20	..
Dressmaker ..	6	..	..	2	4	Industrial school	1	..	..	1	..
Bootmaker ..	1	..	1	..	..	Occupation not stated ..	18	8	7	1	2
Labourer at freezing-works ..	1	1	..	..	..		226	68	66	40	52
Brewer's assistant	1	..	1	..	..						
Fellmonger ..	1	..	1	..	..						
Carpenter ..	4	1	3	..	..						
Labourer ..	4	1	3	..	..						
Farmer ..	4	..	4	..	..						
Gardener ..	3	..	3	..	..						
Farm-labourer ..	13	1	12	..	..						

Blind.

There were 297 males and 156 females, making a total of 453 persons returned as blind, including 63 who were given in the schedules as "nearly" or "partly" blind. Of the above total number, 15 were inmates of the Jubilee Institute for the Blind at Auckland. It would thus appear that only one out of every thirty persons in the colony who suffered from blindness had been received into the institution. The number of blind persons in 1896 was 344. The proportions in every 10,000 of population show a continuous rise at successive censuses, and that there is more blindness amongst males than females.

Proportions of Blind to every 10,000 People.

	Persons.	Males.	Females.
1874	2·34	2·45	2·18
1878	2·56	2·42	2·73
1881	2·82	2·93	2·68
1886	3·22	3·65	2·70
1891	4·37	4·91	3·74
1896	4·90	5·69	4·01
1901	5·87	7·32	4·26

The proportion of the blind per 10,000 persons living in the past has been: for England, about 8·79; for Ireland, 11·30; for Scotland, 6·95; for Germany, 7·93; for France, 8·37; and for Italy, 7·63. For the Australian States the figures are: Victoria, 8·72; New South Wales, 6·59; Australian Continent, 7·38.

The number of the blind in quinquennial periods of age is stated for each sex. Of 297 males, 100 were under and 197 upwards of 50 years old. Of 156 females, 63 were under 50, and 93 over that age.

Numbers of the Blind at Age-periods.

	Persons.	M.	F.		Persons.	M.	F.
All ages	453	297	156	40 years to 45 years	18	11	7
	——	——	——	45 „ 50 „	22	10	12
Under 5 years ..	3	..	3	50 „ 55 „	23	16	7
5 years to 10 years	16	9	7	55 „ 60 „	45	32	13
10 „ 15 „	17	11	6	60 „ 65 „	37	22	15
15 „ 20 „	15	11	4	65 „ 70 „	74	53	21
20 „ 25 „	20	10	10	70 „ 75 „	46	28	18
25 „ 30 „	14	9	5	75 „ 80 „	36	25	11
30 „ 35 „	17	13	4	80 and upwards	29	21	8
35 „ 40 „	21	16	5				

Of the total number of the blind, 453 persons, there were 43 in regard to whom no information as to occupation is given on the household schedule, 71 (females) were returned as engaged in domestic duties, 15 persons as inmates of the blind institute, 10 as dependent relatives, 132 as of no occupation, 21 as labourers, 21 as

farmers, 9 as farm labourers, 6 as dairy farmers, 5 as sheep-farmers, 8 as carpenters, 10 as pensioners, 6 of independent means, and the rest (96) of various occupations in small numbers each. A complete statement is added, in regard to which it must be remarked that many of the occupations are evidently the past occupations of persons whom blindness has prevented from continuing to work at their usual calling.

OCCUPATIONS (PAST OR PRESENT) OF THE BLIND.

	Persons.	Male.		Female.	
		Under 20.	Over 20.	Under 20.	Over 20.
Barrister (not in practice)	1	..	1	..	..
Surgeon	1	..	1	..	..
Teacher of the blind	2	..	2	..	..
School-teacher	1	..	1	..	..
Musician	3	..	3	..	..
Street musician	1	..	1	..	..
Organ-grinder	2	..	2	..	..
Comedian	1	..	1	..	..
Boarding-house keeper	2	..	2	..	..
Hotelkeeper	1	..	1	..	..
Domestic servant	1	..	..	..	1
Cook	1	..	1	..	..
Capitalist	2	..	2	..	..
Insurance agent	1	..	1	..	..
Proprietor of houses	4	..	4	..	..
Newsvendor	2	..	2	..	..
Butcher	1	..	1	..	..
Assistant butcher	2	..	2	..	..
Fish-hawker	1	..	1	..	..
Fruiterer	2	..	2	..	..
Grocer	3	..	3	..	..
Seed merchant	1	..	1	..	..
Hawker	1	..	1	..	..
Storekeeper	2	..	2	..	..
Commercial traveller	2	..	2	..	..
Cab proprietor	1	..	1	..	..
Mariner	1	..	1	..	..
Waterman	1	..	1	..	..
Lumper	3	..	3	..	..
Compositor	1	..	1	..	..
Piano-tuner	3	..	3	..	..
Basketmaker	4	..	4	..	..
Saddler	1	..	1	..	..
Shipwright	2	..	2	..	..
Cabinetmaker	1	..	1	..	..
Boot- and shoemaker	4	..	4	..	..
Stonemason	2	..	2	..	..
Carpenter	8	..	8	..	..
Plumber	1	..	1	..	..
Painter	1	..	1	..	..
Contractor	1	..	1	..	..
Labourer	21	..	21	..	..
Farmer	21	..	20	..	1
Farm labourer	9		9	..	..
Gardener	1	..	1	..	..
Market-gardener	2	..	2	..	..
Settler	1	..	1	..	..
Dairy-farmer	6	..	5	..	1
Sheep-farmer	5	..	4	..	1
Shepherd	1	..	1	..	..
Fisherman	1	..	1	..	..
Bushman	1	..	1	..	..
Gum-digger	3	..	3	..	..
Miner	1	..	1	..	..
Miner, coal	1	..	1	..	..
Miner, quartz	3	..	3	..	..
Miner, alluvial	4	..	4	..	..
Inspector of minerals	1	..	1	..	..
No occupation	132	11	80	2	39
Independent means	6	..	4	..	2
Pensioner	10	..	9	..	1
Annuitant	3	..	3	..	..
Domestic duties	71	..	..	3	68
Scholar, Government school	2	2	..	..	..
Scholar, private school	1	1	..	..	..
Receiving tuition at home	2	1	..	1	..
Dependent on relative	10	3	..	7	..
Inmate of Blind Institute	15	8	..	7	..
Occupation not stated	43	5	16	..	22
Totals	453	31	266	20	136

Lunacy.

The lunatics enumerated were 2,675 persons, 1,599 males and 1,076 females, nearly all of whom were inmates of the asylums for the insane in the colony. Departmental returns show 2,773 persons (including 22 Maoris, 10 males and 12 females) as the total number of inmates on the 31st December, 1901.

Comparison with the results of previous censuses shows a continually increasing proportion of lunatics to the population in respect of either sex, and that there is considerably more lunacy among the men than women.

Lunatics.—Proportions per 10,000 of Population.

	Persons.	Males.	Females.
Census 1874	19·93	23·28	15·48
„ 1878	20·85	25·07	15·54
„ 1881	22·86	27·30	17·43
„ 1886	26·50	31·03	21·18
„ 1891	27·82	31·28	23·92
„ 1896	31·13	35·70	26·02
„ 1901	34·47	39·23	29·19

The number of males who were lunatics was highest at the period 45–50 years, and the females at 40–45, as will be found by the following statement :—

Lunatics.—Numbers at Quinquennial Age-Periods.

	Persons.	M.	F.
All ages..	2,675	1,599	1,076
Under 5 years	2	1	1
5 years to 10 years	5	3	2
10 „ 15 „	19	11	8
15 „ 20 „	43	22	21
20 „ 25 „	114	63	51
25 „ 30 „	186	108	78
30 „ 35 „	245	141	104
35 „ 40 „	257	145	112
40 „ 45 „	312	176	136
45 „ 50 „	333	213	120
50 „ 55 „	296	177	119
55 „ 60 „	298	191	107
60 „ 65 „	244	139	105
65 „ 70 „	162	109	53
70 „ 75 „	88	60	28
75 „ 80 „	35	21	14
80 years and upwards	22	11	11
Unspecified	14	8	6

The proportion of lunatics per 10,000 males living at the above age-periods was only 5·18 at 15–20 years, but had advanced to 59·67 at 35–40 years, and reached its maximum at the period 55–60, when the proportion was 139·30. In the case of females, the proportion rose to a maximum of 130·97 at 60–65.

In 1900 one person in every 288, exclusive of Maoris, in New Zealand was afflicted with lunacy.

Idiocy.

The number of idiots of both sexes enumerated in the census was 105, against 144 in 1896 ; the proportion to 10,000 of population being 1·36 against 2·02 at the previous census. As with lunacy, the proportion of idiocy amongst the males (1·43 per 10,000) is higher than amongst the females (1·28).

SECTION II.—EDUCATION OF THE PEOPLE.

The information obtained at the time of the census in respect of the degree of education of the people is remarked upon in the Year-book, 1903. Later particulars are now given as to schooling.

School Statistics to 31st December, 1902.

It has been found impossible to collect the full statistics relating to schooling for the year 1903 in time for this work, and the figures for the previous year are accordingly given.

The number of schools, teachers, and scholars, as in December, 1902, are shown in the following summary :—

Description of Schools.	Number of Schools.	Teachers.	Scholars.
European.			
Public (Government) schools (scholars other than Maoris and half-castes)	1,708	3,704	129,234
Public (Government) schools (half-castes living among Europeans)			1,194
Colleges, grammar, and high schools (aided or endowed)	25	155*	3,072
Private and denominational schools (excluding Maori scholars)	297	854	15,624
Industrial schools and orphanages	..	..	746
Native village schools, European children attending	..	..	363
Private Native boarding-schools, European children attending	..	..	19
School for Deaf-mutes	1	..	60
Jubilee Institute for Blind	1	1	20
Totals—European	2,032	4,714	150,332†
Native.			
Native village schools supported by Government (excluding European children stated above)	99	180	3,379
Private Native boarding-schools (maintenance of scholars paid by Government)	4	14	70
Private Native boarding-schools (maintenance of scholars paid from endowments)			150
Private Native day-schools	3	5	97
Public (Government) schools, Maoris attending	..	..	1,667
Public (Government) schools, half-castes living as Maoris attending	..	..	167
Private and denominational schools for Europeans, Maoris attending	..	..	43
Totals—Native	106	199	5,573

* Excluding 59 visiting teachers. † In addition to the above, the census results showed that 5,055 children (2,215 boys, 2,840 girls) were being taught at home in March, 1901. Attendance at Sunday-schools is given further on.

Thus at the end of 1902 there were 2,138 schools of all classes at which members of the European and Maori races were being educated. This was an increase of 29 on the number in 1901. The public primary schools numbered 1,708 in 1902, against 1,677 in 1901. The number of aided or endowed colleges, grammar, and high schools was 25, the same as in the previous year. The number of private schools from which returns were received by the Registrar-General was 297, a decrease of 12. There were also ten industrial schools and orphanages, public and private, at which education was given, as well as a school for deaf-mutes subsidised by Government, and a school for the blind.

The number of schools established for the education of the Native or Maori race was 106, eight more than in 1901.

Public (Government) Schools.

Compared with 1901 there was in 1902 an increase of 911 in the number of pupils belonging to the public schools at the end of the year, and the average attendance shows an increase of 1,914 for the whole year, but a decrease of 798 for the fourth quarter.

SCHOOL ATTENDANCE AND YEARLY INCREASE FROM 1877 TO 1902.

Year	School Attendance.					Yearly Increase on			
	Number belonging at Beginning of Year.	Number belonging at End of Year.	Average Attendance*		Average Attendance expressed as Percentage of Roll-number.	Number belonging at Beginning of Year.	Number belonging at End of Year.	Average Attendance†	
			Fourth Quarter.	Whole Year.				Fourth Quarter.	Whole Year.
1877	...	55,688	...	...	...	...	...	...	...
1878	50,849	65,040	49,435	45,521	...	...	9,352	...	...
1879	59,707	75,566	57,301	53,067	73·8	8,858	10,526	7,866	7,546
1880	68,124	82,401	62,946	60,625	74·6	8,417	6,835	5,645	7,558
1881	74,359	83,560	63,009	61,822	74·2	6,235	1,159	63	1,197
1882	76,309	87,179	66,426	63,709	73·6	1,950	3,619	3,417	1,887
1883	79,416	92,476	70,077	67,373	74·0	3,107	5,297	3,651	3,664
1884	84,883	97,238	74,650	72,657	75·1	5,467	4,762	4,573	5,284
1885	90,670	102,407	80,183	78,327	76·6	5,787	5,169	5,533	5,670
1886	95,377	106,328	83,361	80,737	76·1	4,707	3,921	3,178	2,410
1887	99,206	110,919	87,386	85,637	77·0	3,829	4,591	4,025	4,900
1888	103,534	112,685	90,849	90,108	79·3	4,328	1,766	3,463	4,471
1889	104,919	115,456	94,308	93,374	80·3	1,385	2,771	3,459	3,266
1890	108,158	117,912	96,670	94,632	79·9	3,239	2,456	2,362	1,258
1891	110,665	119,523	96,264	97,058	80·3	2,507	1,611	[−406]	2,426
1892	112,279	122,620	100,917	99,070	80·6	1,614	3,097	4,653	2,012
1893	114,305	124,686	99,872	98,615	78·5	2,026	2,066	[−1,045]	[−455]
1894	116,819	127,300	107,032	104,996	81·8	2,514	2,614	6,279	4,875
1895	119,900	129,856	108,708	108,394	82·8	3,081	2,556	1,676	3,398
1896	122,425	131,037	110,274	110,517	83·3	2,525	1,181	1,566	2,123
1897	123,533	132,197	111,952	112,328	83·9	1,108	1,160	1,678	1,811
1898	123,892	131,621	109,561	111,636	83·4	359	[−576]	[−2,391]	[−692]
1899	123,207	131,315	109,050	110,316	82·6	[−685]	[−306]	[−511]	[−1,320]
1900	123,416	130,724	111,498	111,747	84·1	209	[−591]	2,448	1,431
1901	122,725	131,351	112,354	111,797	84·1	[−691]	627	856	50
1902	123,456	132,262	111,556	113,711	84·9	731	911	[−798]	1,914

* From 1877 to 1893 (inclusive) the "strict" average is given, and for subsequent years the "working" average. † From 1877 to 1894 (inclusive) the increase on the "strict" average is given, and for subsequent years that on the "working" average.

In the report of the Minister of Education the figures are thus commented upon :—

The average of the weekly roll-numbers for the year shows a marked increase (1,083) over that for 1901, but it still falls 9 short of that for the year 1897, which is the highest yet recorded. The figures for 1897 were 133,961; for 1901 they were 132,869; and for 1902 they were 133,952. The number on the roll at the end of the year also shows the substantial increase of 911 over the number on the roll in December, 1901, the actual totals being respectively 132,262 and 131,351, this year's number being in advance of any previous year's.

Partly through the operation of the School Attendance Act of 1901 and partly from other causes, such as the increase in the number of schools in sparsely populated districts, attendance at public schools has improved, and there seems to be good reason to hope that it may still further improve. The standard of regularity of attendance reached in 1900 and 1901—namely, 84·1 of the average weekly roll-number, rose to 84·9 in 1902. This figure is a high one compared with the corresponding figures for the British Isles and for the several States of the Australian Commonwealth. According to the latest returns which are available the average attendance in primary day-schools in England was 83·6 per cent. of the net enrolment, in Scotland 82·9 per cent., and in Ireland 65 per cent. For the Australian States the numbers were: New South Wales, 72·6; Victoria, 66·5; Queensland, 81·3; South Australia, 79·9; Western Australia, 81·6; Tasmania, 74·4. These returns are for 1901 in the case of Scotland, Ireland, and New South Wales, and for 1902 in all other cases.

Education at the public schools is free (except that, at such as are also district high schools, fees are charged for the teaching of the higher branches) and purely secular. The attendance of all children between the ages of 7 and 14 is compulsory, except when special exemptions are granted, or a child is being otherwise sufficiently educated.

The subjects to be taught at the primary schools are required by the Education Act to be the following: Reading, writing, arithmetic, English grammar and composition, geography, history (including civic instruction), elementary science and drawing, object-lessons, vocal music, physical instruction, moral instruction, nature study, health, and (in the case of girls) sewing and needlework, and the principles of domestic economy. Provision must also be made for the instruction in military drill of all boys in these schools.

Technical Education.

The Manual and Technical Instruction Act of 1900, and the amending Act of 1902, provides for public instruction in such manual and technical subjects as are set forth in the regulations thereunder. The same Acts provide also for the instruction in elementary handwork of pupils attending primary or secondary schools.

All classes recognised under the Act are eligible for grants in aid of necessary buildings, furniture, and apparatus, and for capitation. During 1902 capitation was paid on classes for drawing (various branches), painting, modelling, design, wood-carving, architecture, carpentry and joinery, plumbing, painters' and decorators' work, mechanical and electrical engineering, natural and experimental science (various branches), languages, mathematics, commercial subjects, cookery, laundry work, dressmaking, tailoring, wool-sorting, and singing.

Special classes were maintained by Government grants for the training of public-school teachers in the subjects of manual and technical instruction prescribed and established in several of the education districts of the colony.

The subjects taken up in school classes included cookery, woodwork, cottage gardening, swimming and life-saving, first aid and ambulance, dressmaking, and laundry work.

There were (1902) fifteen Technical or Art Schools, at which 350 recognised classes, attended by about 4,500 students, were conducted. Several new schools were in course of erection, and others contemplated.

In connection with the Canterbury College there is an endowed School of Engineering and Technical Science, the students in which work for the university degree of B.Sc. in engineering. One hundred and ninety-two students attended in 1902.

The Canterbury Agricultural College has an endowment of 62,000 acres of land, of the rental value of £1,500 per annum, and possesses extensive buildings, and an experimental farm of a very complete character. The institution offers an opportunity to acquire a thorough knowledge of the science and practice of agriculture. Two years' residence at the college is accepted by the University of New Zealand as part of the curriculum qualifying for the degree of B.Sc. in agriculture. The college accommodates forty students.

There are several Schools of Mines located in districts in which mining is actively carried on, and the Otago University maintains a professorial chair of mining and metallurgy, to which the Government makes an annual grant of £500. The number of students in mining in 1902 was over three hundred, sixty of whom were at the Otago University.

With the view of encouraging attendance at recognised technical schools and classes, arrangements have been made with the Railway Department by which teachers of classes registered with the Minister of Education may give certificates to their pupils which will enable them to obtain railway tickets at special rates.

The following table shows the results of examinations conducted in the colony on behalf of the Science and Art Department, London, and of the City and Guilds of London Institute:—

ART, SCIENCE, AND TECHNOLOGICAL EXAMINATIONS, 1902.

["C" represents candidates; "P" passes.]

Subjects of Examination.	Auckland.		Wanganui.		Wellington.		Masterton.		Pahiatua.		Napier.		Christchurch.		Timaru.		Dunedin.		Invercargill.	
BOARD OF EDUCATION, S. KENSINGTON.	C	P	C	P	C	P	C	P	C	P	C	P	C	P	C	P	C	P	C	P
Art.																				
Drawing on the blackboard	5	5	...	...	...	...	...	...	...	...	1	..	2	2	...	...	...	...	...	...
Geometrical drawing (art)	1	...	3	3	2	2	5	...	...	...	1	1	3	3	4	3	4	3	...	...
Perspective	5	3	...	...	2	2	...	...	...	...	2	2	1	...	...	...	8	5	...	...
Model drawing	7	7	4	4	4	3	1	..	...	...	4	3	10	6	...	...	9	9	2	1
Freehand drawing in outline	15	14	7	7	1	1	1	2	2	...	...	...	9	6	3	2	10	10	2	1
Drawing in light and shade	10	5	1	1	1	1	...	...	...	...	...	...	3	1	...	...	7	7	1	...
Principles of ornament	...	...	...	...	...	...	...	...	...	...	1	1	1	...	...	...	3	1	...	...
Design	...	...	1	1	3	2	...	...	...	...	3	1	...	...	...	...	3	3	...	...
Modelling design	...	...	...	...	...	...	...	...	...	...	1	1	...	...	...	...	...	...	...	...
Memory drawing of plant-form	...	...	1	1	...	...	...	...	...	...	2	2	...	...	...	...	...	...	...	...
Painting from still life	...	...	...	...	...	...	...	...	...	...	...	...	2	2	1	...	...	...	...	...
" ornament	...	...	...	...	...	...	...	...	...	...	1	1	...	...	...	...	1	1	...	...
Drawing from the antique	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	4	3	...	...
Anatomy	...	...	...	...	...	...	...	...	...	...	1	1	...	...	...	...	...	..	...	...
Drawing from life	...	...	...	...	...	...	...	..	...	...	...	...	1	1	..	...	2	2	...	..
Modelling the head from life	...	...	...	...	...	...	...	...	...	...	1	1	..	..	...	...	...	...	...	...
Students' works	11	10	2	2	11	*3	...	...	...		3	1	2	2	...	...	13	†6	...	...
Science.																				
Practical plane and solid geometry	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	3	3	1	1
Machine construction and drawing	20	6	3	3	14	10	...	...	...	...	...	...	...	...	...	...	10	6	7	5
Building construction	1	1	1	...	13	9	...	...	...	...	...	...	9	6	...	...	7	5	..	..
Mathematics	1	...	...	...	1	...	...	...	...	...	...	...	...	...	1	..	...	...	...	...
Applied mechanics	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	9	7	...	...
Steam	...	...	...	...	7	3	...	...	...	...	...	...	...	...	...	...	2	2	...	...
Magnetism and electricity	3	3	...	...	3	3	...	...	...	...	...	...	...	...	...	...	...	...	...	...
Agricultural science	..	..	1	1	...	...	..	..	...	...	...	...	...	...	...	...	...	...	...	...
Theoretical inorganic chemistry	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
CITY AND GUILDS OF LONDON INSTITUTE.																				
Woodwork, first year	...	...	...	...	...	...	...	...	...	...	...	...	7	5	...	...	...	...	18	13
" final	...	...	...	...	...	...	...	...	...	...	...	...	1	...	...	...	...	...	2	1
Carpentry and joinery (ordinary)	...	..	...	...	...	...	...	...	...	...	...	..	1	1	...	...	...	...	...	...
Mechanical engineering	...	...	...	1	...	2	...	...	...	...	...	...	...	...	...	...	10	8	...	...
Plumbers' work (preliminary)	3	...	...	...	5	4	...	...	...	...	...	...	...	..	...	...	...	...	...	...
" (ordinary)	3	...	...	...	5	5	...	...	...	...	...	...	...	...	...	...	2	2	...	...
" (honours)	...	..	...	...	...	...	...	...	...	...	...	...	...	...	...	...	3	2	...	...
Painters' and decorators' work	...	...	...	..	...	...	...	...	...	...	...	...	3	2	...	...	...	...	...	...
Gas manufacture	...	...	...	...	2	2	...	...	...	...	...	...	...	...	...	...	...	...	...	...
Electric light and power (preliminary)	...	..	.	.	10	10	...	...	...	...	...	...	1	1	...	...	..	...	...	...
Electric light and power	1	1	...	...	9	6	...	.	...	...	...	...	...	...	...	...	1	...	...	...
Electric light and power, wiremen's work	...	...	...	...	2	...	..	..	...	...	...	...	...	...	...	...	...	...	...	...
Telegraphy and telephony	...	...	...	...	...	...	...	..	.	.	1	1	4	3	...	...	...	...	...	...
Cookery	...	...	...	...	...	...	...	...	...	...	...	...	20	18	...	...	...	...	...	...
Totals	87	55	25	23	97	66	7	1	2	2	22	16	80	59	9	5	111	85	33	22

Total of papers, 473; total of passes, 334.

* A bronze medal and a book prize were also gained by Wellington students. † A prize was also gained by a Dunedin student.

In the twenty-sixth annual report, the Minister of Education remarks as follows on manual training and technical instruction:—

"A great advance was made during 1902 in respect to manual and technical education. The total number of recognised classes, which at the end of 1901 was 425, increased to 980 at the close of 1902. Of these, 566 were classes for handwork in schools, and

414 were 'special,' 'associated,' or 'college classes,' of which 64 were continuation classes—that is, classes for adults or for boys and girls that have left the day schools—in the ordinary branches of a general education, and the remaining 350 were technical classes properly so called. The total number of classes that so far are known to be in operation during the year 1903 is about 1,800. The number of classes for handwork in the upper classes of the public schools is still small in comparison with the number of classes doing such work in the lower classes; with the introduction of the new standard syllabus shortly to be issued all excuse for this anomaly will disappear. One of the most pleasing features of the year is the increase of the number of classes in country schools and of classes for adults in small country towns. Much more might be done, especially if the agricultural associations and the local authorities generally would follow the example so well set by a few of them.

"The Act of 1902, it may be pointed out, by recognising Borough Councils, County Councils, and other local authorities as bodies that might join with Boards of Education, School Committees, or the governing bodies of University colleges to form technical classes, and by giving such authorities representation on the boards of managers, placed them in the same position as associations of various kinds were placed in before. There is now really nothing to prevent any district or any body of persons in a district from starting classes under the Act and securing grants sufficient to equip and carry on the classes, unless it be the comparatively small number of thoroughly competent instructors that are to be obtained. This, however, is an evil that is being gradually removed as those who have been attending training classes for teachers in these subjects become qualified.

"The grants to Education Boards for the instruction of teachers in manual and technical subjects, amounting in all to £1,875, were available for the year 1902 as in 1901, and the amounts were paid over to all the Boards that had complied with the conditions; similar grants will be available during 1903. The revised regulations that were gazetted in December, 1902, considerably simplified the mode in which grants are obtained. Supplementary regulations, approved in June, 1903, offered grants not exceeding £5 per annum on account of each pupil admitted free to technical classes, provided such pupil had passed Standard VI. or a higher examination. These free places are called 'junior technical scholarships'; they last for two years, and may be extended (as 'senior technical scholarships') for two years more if the holders show signs of satisfactory progress. In order that the substratum on which technical education is based may be sound, it is made a condition of the tenure of the junior technical scholarships that the holders shall attend continuation classes in one or more subjects of general instruction, such as English or some other language, and arithmetic or some other branch of mathematics. It is, indeed, difficult to see what more could be done by statute or regulation to

encourage manual and technical education; it is now a matter for those in the various parts of the colony to start such classes as are suited to the wants of the several districts. Some have urged that Government ought to go further and establish classes everywhere; but it is tolerably certain that to set up classes where people are not prepared to make some effort in their own behalf would result in a considerable waste of public money without any corresponding benefit.

"The grants for buildings and apparatus paid during 1902 amounted to £4,997 8s. 3d.; for material, £246 1s. 8d.; capitation, £5,604 17s. 4d."

In the following table a statement is given of the expenditure upon manual and technical instruction during the year:—

STATEMENT OF EXPENDITURE FOR YEAR ENDING 31ST DECEMBER, 1902.

	£	s.	d.	£	s.	d.
Capitation				5,604	17	4
Subsidy of pound for pound on contributions				428	5	2
Grants:—						
Buildings and apparatus	4,997	8	3			
Class material	246	1	8			
				5,243	9	11
Training of Teachers:—						
Auckland Education Board						
Taranaki "	100	0	0			
Wanganui "						
Wellington "	200	0	0			
Hawke's Bay "	150	0	0			
Marlborough "						
Nelson "	125	0	0			
Grey "						
Westland "	75	0	0			
North Canterbury "	200	0	0			
South " "	125	0	0			
Otago "	200	0	0			
Southland "	150	0	0			
				1,325	0	0
Grants in aid of classes				116	15	5
Railway fares of teachers attending training-classes				1,094	16	6
Railway fares of instructors of training-classes				123	11	8
" students attending registered classes				186	2	6
Scholarships				145	16	0
Expenses in connection with Examinations:—						
Science and Art Board of Education, South Kensington, with City and Guilds of London Institute				224	3	11
Students' works, books, publications, &c.				71	13	5
Advertising and sundries				43	0	5
Inspectors' salaries and travelling-expenses				911	16	7
				15,519	8	10
Less recoveries (examination fees: South Kensington, £44 5s.; City and Guilds, £16 7s. 6d.)				60	12	6
Total				£15,458	16	4

School or Classes.	Number of Classes.	Subjects of Instruction, and Average Attendance.																	
		Freehand (from the Flat and Round), Light and Shade.	Plane and Solid Geometry. Perspective.	Design and Ornament.	Drawing, Modelling, and Painting from Antique and Nature.	Architecture, and Building-construction.	Mechanical Drawing and Machine-construction.	Practical Mechanics and Mathematics.	Mechanical and Electrical Engineering.	Experimental and Natural Science (Chemistry, Physics, Botany, Photography).	Woodwork and Ironwork.	Wood-carving, Modelling, and Repoussé Work.	Carpentry and Joinery, Painters' and Decorators' Work.	Plumbing and Tinsmiths' Work.	Cookery and Laundry-work, Dressmaking, Tailoring.	Wool-sorting.	Commercial Subjects.	English, Latin, French, Maori, Arithmetic.	Singing and Elocution.	Training classes for Teachers in Elementary Handwork and Drawing.
Auckland Education Board—																			
Technical School, Auckland ..	8	9	..	..	..	14	13	4	..	..	..	11	27	14	..	..	..	..	..	..
"Elam" School of Art, Auckland	17	326	..	..	15	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
Taranaki Education Board—																				
Technical classes, New Plymouth	5	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	60
" Stratford ..	3	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	29
Wanganui Education Board—																				
Technical classes, Wanganui ..	30	36	23	..	28	8	9	23	..	11	..	26	..	20	..	..	14	15	..	..
" Palmerston N.	17	42	12	..	5	..	..	..	..	14	..	10	..	..	..	..	10	55	..	..
" Hawera ..	8	25	2	..	..	..	..	..	..	..	..	5	..	..	..	..	..	..	..	..
" Eltham ..	2	..	..	..	..	..	..	..	..	..	..	7	..	..	..	..	..	..	..	..
" Patea ..	2	..	..	..	..	..	..	..	..	..	..	8	..	..	..	..	..	..	..	..
" Marton ..	2	..	..	..	..	..	..	..	..	..	..	13	..	..	..	..	..	..	..	..
Wellington Education Board—																				
Technical School, Wellington ..	39	104	8	43	173	41	60	30	2	17	..	52	24	43	..	..	128	42	..	93
Technical classes, Masterton ..	1	9	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
" Pahiatua ..	1	17	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
Masterton Technical Classes Association	8	27	..	..	16	14	..	..	..	..	..	..	8	..	..	..	19	9	..	..
Hawke's Bay Education Board—																				
Technical School, Napier ..	7	57	..	61	6	..	..	..	..	..	..	..	..	28	..	..	..	..	..	59
Technical classes, Gisborne ..	4	35	..	37	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	25
" Woodville ..	1	10	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
" Dannevirke	1	10	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
Continuation classes, Wairoa ..	5	..	..	..	..	..	..	11	..	..	..	..	..	..	..	..	8	19	..	..

Marlborough Education Board—																				
Continuation classes, Waitohi..	1	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	9	..	..	
Nelson Education Board—																				
Technical classes, Nelson ..	3	..	..	..	..	..	..	..	..	..	..	..	..	..	28	..	..	..	..	62
Westland Education Board—																				
Technical classes, Kumara ..	1	..	..	..	..	..	..	..	..	..	18	..	..	..	..	..	..	..	..	..
Board of Governors, Canterbury College—																				
School of Art, Christchurch ..	41	218	95	131	47	55	..	..	..	..	..	53	32	13	..	..	..	..	..	104
School of Engineering Christchurch	29	..	..	..	..	..	119	21	78	28	..	..	..	..	..	..	..	..	..	..
School of Domestic Instruction, Christchurch	12	..	..	..	..	..	..	..	..	..	..	..	..	..	132	..	..	..	..	..
North Canterbury Education Board—																				
Technical classes, Normal School, Christchurch	6	..	..	..	..	..	..	..	..	..	51	..	14	..	..	..	..	..	..	61
Technical classes, Ashburton ..	2	..	..	..	..	..	..	..	..	..	..	..	16	..	..	..	..	..	..	21
" Lyttelton ..	5	..	..	..	..	..	..	5	..	..	..	..	54	..	38	..	20	..	..	..
" Rangiora ..	4	16	..	..	..	..	16	..	..	..	..	..	..	..	37	..	..	..	..	..
" Leeston ..	2	..	..	..	..	..	..	..	..	..	22	..	..	..	..	..	..	..	..	..
South Canterbury Education Board—																				
Timaru Technical Classes Association	14	14	..	..	10	..	26	..	..	..	..	12	..	..	70	..	97	132	72	..
Technical classes, Timaru ..	6	..	..	..	..	..	..	..	..	..	28	..	..	..	..	..	..	..	..	65
Waimate Technical Classes Association	8	15	..	..	..	..	..	..	..	..	..	11	..	..	20	..	54	12	..	..
Otago Education Board—																				
School of Art, Dunedin ..	39	241	108	32	35	14	23	..	..	..	..	..	..	..	..	..	..	..	..	..
Technical School, Dunedin ..	39	..	..	..	..	..	..	36	23	65	..	27	17	30	73	15	185	144	25	..
Technical classes, Port Chalmers	3	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	20	..	..	..
Southland Education Board—																				
Technical School, Invercargill..	23	6	..	..	10	8	27	..	..	13	36	12	7	..	102	..	78	23	23	..
Technical classes, Gore ..	6	..	..	..	..	..	..	..	..	..	..	..	..	..	10	..	31	..	..	51
" Mataura ..	2	..	..	..	..	..	..	..	..	..	..	..	..	..	15	..	..	..	18	..
Country Continuation-classes ..	7	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	2	38	..	..
Totals	414	1,217	248	304	345	154	293	130	103	148	155	247	199	148	525	15	666	498	138	630

Controlling Authority.	Subjects of Instruction and Number of Classes in each Subject.												
	*Elementary Handwork.	Drawing in Light and Shade (Blackboard Drawing).	Elementary Design.	Cookery.	Dressmaking.	Woodwork.	Chemistry.	Physics.	Cottage Gardening.	Agriculture and Agricultural Chemistry.	Ambulance and First-aid.	Swimming and Life-saving.
Education Board, Auckland	34	...	1	...	...	1	...	...	...	...	1	1
Education Board, Taranaki	18	...	3	...	...	...	...	...	1	...	3	1
Board of Governors, High School, New Plymouth	...	...	...	...	1	...	...	...	...	...	...	...
Education Board, Wanganui	...	...	...	1	...	...	...	...	...	...	1	1
Education Board, Wellington	73	...	17	24	...	1	...	...	1	1	...	...
Board of Governors, Wellington College and Girls' High School—												
Girls' High School	1	...	1	...	...	...	...	...	...	...	...	...
Education Board, Hawke's Bay	33	3	11	...	1	...	...	...	1	...	1	...
Education Board, Nelson	14	...	...	9	...	...	...	...	...	...	3	5
Board of Governors, Nelson College—												
Girls' College, Nelson	...	...	...	2	...	...	...	...	...	...	...	...
Education Board, Westland	17	...	...	...	...	...	...	...	...	...	...	...
Education Board, North Canterbury	72	...	1	13	...	3	...	...	...	...	...	18
Board of Governors, Canterbury College—												
Boys' High School, Christchurch	...	...	...	...	...	4	1	1	...	...	...	...
Girls' High School, Christchurch	...	1	1	2	2	...	...	...	...	...	...	1
Board of Governors, Ashburton High School	...	...	...	...	...	1	...	...	...	...	...	...
Education Board, South Canterbury	29	4	...	...	...	...	...	...	...	...	...	...
Board of Governors, Timaru High Schools—												
Boys' High School	...	...	...	...	...	1	...	...	...	...	...	1
Girls' High School	...	...	...	1	1	...	...	...	...	...	...	...
Education Board, Otago	27	...	...	10	...	1	...	1	2	1	...	9
Education Board, Southland	55	...	...	...	3	1	...	...	1	...	5	...
Board of Governors, Southland High Schools	...	...	...	1	1	1	2	...	...	...	...	...
Totals	373	8	35	63	9	14	3	2	6	2	14	37

* Modelling, brush drawing, paper, carton, and cardboard work, stick, and brick-laying, cane-weaving, &c.

New Zealand University.

The introduction of university education into New Zealand was effected by the Superintendent and Provincial Council of Otago, who in 1869 passed an Ordinance under which the University of Otago was established. Following closely on the founding of this institution was the establishment of the University of New Zealand under an Act of the General Assembly, "The New Zealand University Act, 1870." This University subsequently received a Royal charter, whereby the degrees which it confers are declared entitled to "rank, precedence, and consideration" throughout the British Empire "as fully as if the said degrees had been conferred by any university of the United Kingdom." It was apparently contemplated by Parliament (*vide* section 19 of the Act last quoted) that the New Zealand University and the Otago University should be amalgamated; but the negotiations for this purpose having failed the two institutions remained for some time distinct bodies. In the year 1874, however, the University of Otago surrendered or put in abeyance its power of conferring degrees, and became affiliated to the University of New Zealand, and at the same time it was stipulated that the University of New Zealand should not directly exercise functions of teaching.

In 1902 an amendment Act was passed reconstituting the Senate, which now consists of twenty-four members or Fellows, five to be elected by each of the four University College districts, that is to say—two by each governing body, two by each District Court of Convocation, and one by each Professorial Board. The remaining four members are nominated by the Governor in Council.

In the year 1873 the Superintendent and Provincial Council of Canterbury passed an Ordinance for founding "The Canterbury College," and the college was accordingly established with the same standard of university education as that of the University of Otago, but without the power of conferring degrees.

In December, 1878, a Royal Commission on University and Secondary Education was appointed by the Governor, which met in July, 1879, and reported that two colleges, with an income of £4,000 each, ought to be established in Auckland and Wellington, and that suitable buildings, at a cost of £12,500 each, should be erected in those cities. In the following year the Royal Commission repeated these recommendations.

"The Auckland University College Act, 1882," which became law on the 13th September in that year, definitely established the college, and endowed it with a statutory grant of £4,000 per annum. By "The Auckland University College Reserves Act, 1885," three blocks of land, containing about 10,000 acres each, and a block containing about 354 acres, which had been devoted to the purpose of promoting higher education in the Province of Auckland, became vested in the Council of University College.

The Auckland University College was affiliated to the University of New Zealand by the Senate of the university on the 6th March, 1883, and on the 21st May in the same year the college was opened by the Governor.

Nothing was done for Wellington until the year 1894, when an Act was passed entitled "The Middle District of New Zealand University College Act, 1894," which said "There shall be established in the City of Wellington a college to be connected with the University of New Zealand," and provision was made for a governing body to be called the Council, but no provision was made for any pecuniary grant nor any endowment, and, though certain members of the Council were appointed, nothing could be done for want of funds.

Not until 1897 were the needs of Wellington actually attended to. In the session of Parliament that year the Right Hon. Mr. Seddon, P.C., Premier of the colony, introduced the Victoria College Act: an Act, as stated in the preamble, "to promote higher education by the establishment of a College at Wellington in commemoration of the sixtieth year of the reign of Her Majesty Queen Victoria," the college being intended to embrace in its work the Provincial Districts of Wellington, Taranaki, Hawke's Bay, Nelson, Marlborough, and Westland. The Act was passed on the 22nd December, 1897, and the Council was formed as provided in the Act, and the work of organization was begun. The Act provides for the payment out of the Consolidated Fund of a grant of £4,000 a year, and also requires the Council to give six scholarships each year, called "Queen's Scholarships," to persons of either sex under the age of fourteen years, upon the results of an examination under such conditions as the Council may provide. The Act further sets apart a parcel of land 4,000 acres in extent in the Nukumaru Survey District (Wellington Provincial District) as an endowment for the college.

The Council of the college has established six chairs: classics, English, mathematics and mathematical physics, chemistry, physics, and biology; and lectureships in modern languages, mental science, jurisprudence and constitutional history, general history, and political economy and law. It is intended as funds allow to add other subjects.

The New Zealand University is not a teaching body, as above explained, undergraduates hitherto for the most part keeping their terms at one or other of the affiliated institutions: the Auckland University College, the Victoria College, the Canterbury College, and the University of Otago, each of which has now a staff of professors and lecturers. On the 1st June, 1903, the number of graduates who had obtained direct degrees was 866.

The number of undergraduates on the roll of the University at that date was 2,782 (exclusive of such as had not performed any academical act for a period of ten years), but only 1,768 were keeping terms (not including undergraduates who had not, in the last two years, entered at a college or come up for any college or university examination), of whom 1,160 were males

and 608 females. One hundred and thirty of the males and twenty-four of the females were medical students. The numbers of students attending lectures at the affiliated institutions during the year 1902 were as follow: At the Auckland University College, 114 matriculated and 123 non-matriculated; at Canterbury College, 151 matriculated and 74 non-matriculated; at the Otago University, 186 matriculated and 49 non-matriculated. The Victoria College, before-mentioned, affords further facilities for university students, and in June, 1903, had a total of 167 students on the roll—137 matriculated and 30 non-matriculated.

Private and Denominational Schools.

There were 297 private schools in the colony at the end of 1902, a decrease of 12 on the number in 1901: 26 were for boys, 65 for girls, and 206 for children of both sexes. The number of pupils attending them was 15,624—namely, 6,451 boys and 9,173 girls, not counting 43 Maoris, 22 boys and 21 girls. The number of European pupils at these schools was greater than in 1901 by 280. Of the private schools, 139 were Roman Catholic, with an attendance of 10,802 pupils.

The following gives, for the past ten years, the number of private schools and of Europeans attending them, the number of Roman Catholic schools and pupils being also shown separately:—

Year.	Number of Private Schools.	Pupils.			Included in Previous Numbers.	
		Boys.	Girls.	Totals.	Roman Catholic Schools.	Pupils at Roman Catholic Schools.
1893	299	6,431	8,491	14,922	111	10,263
1894	302	6,117	8,510	14,627	117	9,953
1895	298	6,187	8,472	14,659	114	10,458
1896	283	5,845	8,102	13,947	115	9,590
1897	278	5,974	8,473	14,447	120	9,642
1898	294	6,043	8,739	14,782	124	10,175
1899	307	6,219	9,076	15,295	133	10,526
1900	304	6,152	9,403	15,555	132	10,687
1901	309	6,244	9,100	15,344	129	10,448
1902	297	6,451	9,173	15,624	139	10,802

The total number of children of European descent (including such half-castes as live among Europeans) known to be receiving education at school at the end of 1902 was 150,332; of these, 142,168 were from 5 to 15 years of age. The census showed also 5,055 children receiving tuition at home in 1901, against 6,352 in 1896. No doubt increased school accommodation in country places does away with the need for tutors and governesses to a certain extent.

The distribution of the private schools in the various provincial districts of the colony is shown in the next page:—

PRIVATE AND DENOMINATIONAL SCHOOLS, 1902.—SUMMARY BY PROVINCIAL DISTRICTS.

Provincial Districts.	Number of Schools.				Number of Teachers.			Number of Scholars.			Daily Average Attendance.		
	Boys.	Girls.	Mixed.	Total.	Male.	Female.	Total.	Male.	Female.	Total.	Male.	Female.	Total.
Auckland	2	14	62	78	24	170	194	1,295	2,041	3,336	1,094	1,755	2,849
Taranaki	...	3	10	13	...	28	28	224	396	620	176	339	515
Hawke's Bay	4	5	7	16	9	47	56	471	588	1,059	393	509	902
Wellington...	6	15	34	55	45	158	203	1,412	1,922	3,334	1,246	1,708	2,954
Marlborough	1	...	3	4	...	9	9	134	139	273	106	123	229
Nelson	2	4	10	16	9	35	44	381	490	871	352	461	813
Westland	1	2	9	12	3	24	27	254	356	610	224	317	541
Canterbury	6	14	38	58	16	141	157	1,215	1,654	2,869	1039	1,468	2,507
Otago	4	8	33	45	15	121	136	1,065	1,587	2,652	914	1,318	2,232
Totals	26	65	206	297	121	733	854	6,451	9,173	15,624*	5,544	7,998	13,542

* Exclusive of 43 Maoris (22 boys, 21 girls).

NOTE.—Denominational schools, such as Roman Catholic and Anglican, are included in the above as private schools. Particulars for the Roman Catholic schools in December, 1902, are as under:—

SUMMARY OF ROMAN CATHOLIC SCHOOLS.

Provincial Districts.	Number of Schools.				Number of Teachers.			Number of Scholars.			Daily Average Attendance.		
	Boys.	Girls.	Mixed.	Total.	Male.	Female.	Total.	Male.	Female.	Total.	Male.	Female.	Total.
Auckland	1	9	22	32	4	82	86	508	1,256	2,064	672	1,076	1,748
Taranaki	...	2	4	6	...	15	15	150	269	419	117	233	350
Hawke's Bay	2	2	4	8	4	33	37	371	451	822	301	379	680
Wellington	3	6	11	20	21	65	86	929	1,180	2,109	812	1,041	1,853
Marlborough	1	...	2	3	...	7	7	128	123	251	102	109	211
Nelson	1	3	3	7	...	20	20	156	328	484	134	305	439
Westland	1	2	8	11	3	23	26	246	347	593	218	311	529
Canterbury	3	4	18	25	10	66	76	918	1,095	2,013	771	987	1,758
Otago	4	4	19	27	14	68	82	921	1,126	2,047	800	935	1,735
Totals	16	32	91	139	56	379	435	4,627	6,175	10,802	3,927	5,376	9,303

Schools for Natives.

The number of Native village schools at the end of 1902 either supported or subsidised by the Government was 99, or eight more than at the end of the previous year. In addition, there were four boarding-schools for Native children, the cost of whose maintenance was partly paid either by the Government or from endowments, and three private Native day-schools. The number of Maori children attending schools during the fourth quarter of 1902 was 5,573—namely, 3,130 males and 2,443 females. These included 336 half-castes at the Native village schools who were living as members of Maori tribes, and 167 at public European schools.

The numbers at the several schools in 1901 and 1902 were as under:—

Schools.	Maori Children attending Schools.					
	Boys.		Girls.		Total of both Sexes.	
	1901.	1902.	1901.	1902.	1901.	1902.
At public European schools ..	936	1,026	680	808	1,616	1,834
At Native village schools ..	1,641	1,895	1,294	1,484	2,935	3,379
At subsidised or endowed boarding-schools	122	120	90	100	212	220
At private European or Native schools	92	89	57	51	149	140
Totals	2,791	3,130	2,121	2,443	4,912	5,573

There was thus, in 1902, an increase of 339 in the number of Maori boys, and 322 in the number of Maori girls, attending school.

Seventy-six out of the ninety-nine Native village schools in operation on 31st December, 1902, were under the charge of masters and nineteen under mistresses, and one under the joint control of a master and mistress; there were besides eighty-four assistants, and eleven sewing-mistresses. The salaries paid to the head-teachers range from £55 10s. to £271, and those for assistants and sewing-mistresses from a nominal sum to £50.

The expenditure on Native schools for 1902 was as follows: Teachers' salaries and allowances, £15,622 1s. 5d.; books and school requisites, £419 16s. 3d.; repairs and small works, £877 14s. 4d.; inspection, £909 3s.; organising instructor's salary and travelling-expenses, £493 11s. 7d.; boarding-schools and scholarships, £2,174 7s. 11d.; buildings, fencing, furniture, &c., £5,593 8s. 9d.; technical instruction classes, £548 5s. 2d.; sundries, £307 19s. 1d.: total, £26,946 7s. 6d.

Income and Expenditure of Education Boards.

The total income of the various Education Boards for the year 1902 was £579,468, including £770 of deposits, refunds, &c. The grants by Government amounted to £528,372. These grants under

"The Public School Teachers' Salaries Act, 1901," consist of (*a*) payments to the Board of every district of a sum sufficient to pay the salaries of teachers and pupil-teachers in the district, (*b*) further payments of a sum of £250 per annum, together with a sum of 11s. 3d. per annum for each child in daily average attendance at a public school. (The Governor may by Order in Council declare that in lieu of (*b*) there shall be paid to the Boards a capitation allowance of 12s., and in addition £250 per annum to each Board having a daily average attendance of less than 8,000 children). There is also (*c*) a varying sum for school buildings, and (*d*) grants for technical education. The income from reserves amounted to £43,047, and that from local receipts, &c., to £8,049.

The total expenditure in 1902 amounted to £567,990, of which the sum of £464,084 was laid out on the maintenance of the schools.

The receipts and expenditure of the Education Boards, numbering thirteen altogether, are tabulated below, with further particulars:—

RECEIPTS AND EXPENDITURE OF EDUCATION BOARDS.

Receipts.	£	s.	d.	*Expenditure.*	£	s.	d.
To Balance, 1st January, 1902 ...	6,596	19	9	By Boards' administration	14,215	6	6
Government grants—				Inspection and examination	14,215	2	10
Rents from reserves ... £43,046 17 10				Teachers' salaries and allowances	419,701	8	8
Balance of grants for salaries, &c., of teachers 376,924 13 6				Incidental expenses of schools	32,729	6	11
Allowance £250 and capitation ... 67,961 3 10				Scholarships	8,617	13	3
Other grants 14,080 10 7				Training of teachers ...	3,035	18	4
Total for maintenance	502,013	5	9	Manual and technical instruction	11,605	7	9
Buildings	60,679	11	3	Truancy-prevention expenses...	1,163	7	11
Manual and technical instruction	8,726	4	11	Buildings, sites, plans, &c.	61,763	5	2
Local receipts—				Interest, exchange, refunds, &c.	942	17	2
Fees, donations, &c. ...	5,446	0	6	Balance, 31st December, 1902	18,075	1	5
Rents, &c. ...	1,832	7	9				
Deposits, refunds, &c. ...	770	6	0				
	£586,064	15	11		£586,064	15	11

SCHOLARSHIPS.

National Scholarships.

An Act to encourage higher education in New Zealand by the granting of national scholarships was passed at the last session of Parliament (1903). It provides for the establishment of junior and senior scholarships, the necessary funds being furnished by the Colonial Treasurer.

A junior scholarship is offered in each education district for every five thousand or part of five thousand children in average yearly attendance, tenable for three years, with an extension of one year under certain conditions. The value of a junior scholarship is £10 per annum in addition to tuition fees. Candidates must be under fourteen years of age. A scholarship shall not be awarded to or held by any child whose parents are in receipt of a net annual income exceeding £250.

Four senior national scholarships are offered in each university district to persons of either sex under nineteen years of age who have been holders of junior scholarships or Education Board scholarships, and will be awarded on the result of the junior scholarship examination of the university. The value of a senior scholarship is £20 per annum in addition to tuition fees, and it is tenable for three years.

Where the holder of a junior or senior national scholarship is obliged to live away from home in order to prosecute his or her studies an additional sum of £30 per annum shall be paid.

Queen's Scholarships.

"The Queen's Scholarships Act, 1903," provides for the establishment in connection with the Victoria College, and out of its funds, six junior and four senior scholarships, each tenable for three years, but an extension of one year can be obtained under certain conditions in the case of junior scholarships. Each junior scholarship is valued at £10 per annum in addition to tuition fees, and the holder of each senior scholarship is entitled to receive £20 per annum. In both cases an additional £30 per annum is paid if the holder is obliged to live away from home.

Education Board Scholarships.

Particulars of the scholarships and the expenditure of the Boards thereon in 1902 are given in detail. The only institutions for the training of teachers are in North Canterbury and Otago. These two institutions have received grants-in-aid of £500 each.

Education Districts.	Number held in Dec., 1902.	Boys.	Girls.	Period of Tenure.	Boards' Expenditure on Scholarships in 1902.	Annual Value, &c.
				Years.	£ s. d.	
Auckland ...	83	59	24	3	1,747 4 0	4 at £30, 21 at £25, 24 at £20, 34 at £15.
Taranaki ...	14	9	5	2	278 13 10	4 at £35, 2 at £14, 6 at £10, 1 at £4 13s. 4d., 1 at £3 6s. 8d.
Wanganui ...	18	11	7	Varies	635 18 3	13 at £40, 1 at £32 10s., 1 at £32, 1 at £15, 2 at £5.
Wellington ...	39	20	19	2	929 3 6	12 at £35, 27 at £15.
Hawke's Bay ...	25	11	14	2	499 7 1	8 at £30 4s., 2 at £16 4s., 15 at £10 4s.
Marlborough ...	12	3	9	2	163 0 0	at £35, 9 at £10.
Nelson	9	5	4	2	371 17 6	7 at £50 10s., 1 at £25, 1 at £10.
Grey	4	3	1	2	100 0 0	£25.
Westland ...	7	3	4	2	101 11 0	1 at £23, 2 at £17 10s., 4 at £8.
North Canterbury	36	18	18	2	1,183 11 7	19 at £40, 17 at £20.
South Canterbury	31	13	18	2	335 9 8	11 at £22 10s., 1 at £8, 2 at £6, 17 at £2 10s.
Otago	54	36	18	Jun. 2 Sen. 3	1,383 7 2	13 at £40, 4 at £35, 1 at £24, 2 at £22, 17 at £20, 17 at £15.
Southland ...	23	15	8	2 for 3 21 for 2	666 7 10	13 at £35, 1 at £20, 1 at £18, 8 at £15.
Totals, 1902 ...	355	206	149	...	8,395 11 5	
Totals, 1901 ...	358	201	157	...	8,331 10 5	

Secondary or Superior Schools.

Income and Expenditure.

A summary of the accounts of income and expenditure for the year 1902, as furnished by the governing bodies of the secondary or superior schools in the colony, shows the total receipts to have been £73,229. To this total, rents and sales of reserves contributed £25,926; interest on investments, and other receipts from endowments, £7,743; fees, £36,773; and miscellaneous, £2,787.

The total expenditure amounted to £71,762, of which sum office management and expenses absorbed £2,692; teachers' salaries, £38,035; scholarships and prizes, £2,420; buildings, furniture, insurance, rates, and rent, &c., £11,441; and other expenditure, £17,175.

A summary of the accounts for the year 1902, exhibiting further details, is given below:—

Secondary or Superior Schools, 1902.

Receipts.	£	s.	d.	*Expenditure.*	£	s.	d.
To Credit balances on 1st January, 1902	24,892	0	5	By Liabilities on 1st January, 1902	1,357	1	10
Endowment reserves sold	1,165	7	2	Expenses of management	2,692	3	11
Mortgage moneys repaid	2,893	13	1	School salaries	38,034	17	4
Rents of reserves ...	24,760	13	9	Boarding-school accounts	5,575	11	10
Interest on investments	1,984	16	5	Examination expenses ...	575	3	10
Reserves Commissioners' payments	2,864	3	5	Scholarships and prizes ...	2,419	15	0
Government payments for technical instruction ...	85	11	10	Printing, stationery, fuel, light, &c.	3,643	11	10
School fees (tuition) ...	29,241	13	6	Buildings, furniture, insurance, rent, and rates	11,441	1	9
Boarding-school fees ...	7,445	18	0	Expenditure on endowments	2,566	2	4
Books, &c., sold, and refunds	198	13	7	Capital invested	17	10	0
Sundries not classified ...	2,588	5	2	Interest	1,557	14	4
Debit balances, 31st December, 1902	3,299	0	9	Sundries	3,238	17	9
				Credit balances, 31st December, 1902	28,300	5	4
	£101,419	17	1		£101,419	17	1

Free Secondary Education.

In December, 1902, regulations were published offering to the governing bodies of secondary schools, on certain conditions as to age and other qualifications, grants at the rate of £6 a head for pupils admitted without payment of fees for tuition, provided that one free place was already given for each £50 of the net income from endowments. Fifteen out of the twenty-five secondary schools have so far accepted the conditions, and, up to May of the year 1903, 588 pupils were thus receiving free secondary education in these schools; out of this number grants were being paid for 400, the remainder being those admitted at the rate of one for each £50 of such net income.

At the end of 1902 there were 1,426 pupils in the district high schools who, having passed Standard VI., were receiving free instruction in secondary subjects. The number of such schools, which during 1901 had increased from thirteen to twenty-one, rose to thirty-eight at the end of 1902.

Number of Pupils receiving Secondary Education at District High Schools at 31st December, 1902.

Education District.	Number of Schools.	Number of Pupils.							Total Number of Pupils, 1901	Amount paid by Government to Education Boards during the Year.								
		Passed Standard VI.			Others.			Total.		Capitation.			Grants in Aid.			Total.		
		M.	F.	Total.	M.	F.	Total.			£	s.	d.	£	s.	d.	£	s.	d.
Auckland	7	88	82	170	..	..	..	170	59	306	10	0	82	10	0	389	0	0
Taranaki	1	22	10	32	1	1	2	34	32	127	10	0	30	0	0	157	10	0
Wanganui	7	169	158	327	38	13	51	378	168	1,133	0	0	147	10	0	1,280	10	0
Wellington	1	31	49	80	..	..	..	80	..	115	13	4	17	10	0	133	3	4
Hawke's Bay	1	25	24	49	..	..	..	49	26	158	10	0	30	0	0	188	10	0
Marlborough	..	..	..	..	..	..	..	..	..	..			..			..		
Nelson	3	65	59	124	..	..	..	124	33	320	0	0	52	10	0	372	10	0
Grey	1	22	20	42	..	..	..	42	22	186	5	0	30	0	0	216	5	0
Westland	1	13	21	34	..	..	..	34	22	131	0	0	30	0	0	161	0	0
North Canterbury	1	12	18	30	..	..	..	30	19	113	10	0	30	0	0	143	10	0
South Canterbury	3	71	53	124	..	..	..	124	70	502	5	4	82	10	0	584	15	4
Otago	9	172	143	315	..	..	..	315	196	1,177	0	0	240	0	0	1,417	0	0
Southland	3	55	44	99	..	..	..	99	15	111	0	0	45	0	0	156	0	0
Totals for the colony	38	745	681	1,426	39	14	53	1,479	662	4,382	3	8	817	10	0	5,199	13	8
Totals for 1901	21	324	281	605	44	13	57	662	..	1,261	0	0	300	0	0	1,561	0	0

Industrial Schools.

In December, 1902, the total number on the books of all the industrial schools was 1,847, or 84 more than at the close of the year 1901. On the books of the Government industrial schools there were 1,286, an increase of 59 over the corresponding number for 1901; on the books of the private industrial schools there were 561, or 23 more than at the end of the previous year. The number in residence at Government schools was 283, and at private industrial schools 327, so that 610 was the total number of "inmates" actually in residence. The number boarded out was 441, one being from a private school and the rest from Government schools. There were 24 girls maintained in various corrective institutions, 11 boys and girls in orphan homes, 1 boy at the Blind Institute, Auckland, and 2 at the School for Deaf-mutes, Sumner. The total number of inmates dependent on the schools for maintenance was therefore 1,089, or three less than the number at the end of 1901. The remaining 758, although still subject to control and supervision, were not dependent on the schools for maintenance. They may be classified as follows: Licensed to reside with friends, 176; at service, 518; in hospital, 3; in lunatic asylum, 4, in the Costley Training Institution, Auckland, on probation, 1; in other institutions without payment, 12; in gaol, 5; absent without leave, 39: namely, 23 from service and 16 from the schools.

The cost of the Government industrial schools and the amount recovered (from Charitable Aid Boards, from parents, from sale of farm produce, &c.) are next shown:—

Cost of Government Industrial Schools, 1902.

School.	Cost of School.			Cost of Boarding out (Included in preceding column).			Salaries of School Staff. (Included in first column.)			Recoveries.			Net Cost.		
	£	s.	d.	£	s.	d.	£	s.	d.	£	s.	d.	£	s.	d.
Auckland ..	1,850	19	5	870	5	5	336	0	0	596	8	5	1,254	11	0
Levin ..	2,339	4	6	..			207	16	0	7	15	0	2,331	9	6
Burnham ..	6,042	16	9	7	14	2	1,840	12	8	1,615	18	0	4,426	18	9
Caversham ..	8,606	18	5	2,928	0	7	1,367	15	5	3,424	2	8	5,182	15	9
Te Oranga Home	3,263	17	7	..			348	0	0	69	2	6	3,194	15	1
Receiving Home, Wellington	1,575	4	8	891	18	8	187	0	0	427	8	7	1,147	16	1
Receiving Home, Christchurch	3,352	12	10	2,226	8	4	298	0	0	1,047	9	7	2,305	3	3
Totals ..	27,031	14	2	6,924	7	2	4,585	4	1	7,188	4	9	19,843	9	5
Salaries and expenses of Assistant Inspectors and Visiting Officers													1,586	17	0
Travelling-expenses of managers and others													229	16	9
Contingencies													47	8	6
Total													£21,707	11	8

There were six Government industrial schools in existence in 1902, and the numbers of inmates on their books at the end of the year were as follows: Auckland, 106; Receiving Home, Wellington, 100; Receiving Home, Christchurch, 228; Burnham, 271; Te Oranga Home, 50; Caversham, 531: total, 1,286. A school at Levin was in course of erection. Those belonging to private industrial schools were distributed as follows: St. Mary's, Auckland, 134; St. Joseph's, Wellington, 79; St. Mary's, Nelson, 314; St. Vincent de Paul's, Dunedin, 34: total, 561.

The next table shows payments made by the Government on account of inmates in private industrial schools, the recoveries, and the net expenditure by the Government. The contributions from Charitable Aid Boards to these schools, being made directly to the managers, are not included in the recoveries shown.

GOVERNMENT EXPENDITURE ON PRIVATE INDUSTRIAL SCHOOLS (R.C.), 1902.

School.	Payments.	Recoveries.	Net Expenditure by Government.
	£ s. d.	£ s. d.	£ s. d.
St. Mary's, Auckland	1,304 14 0	125 16 8	1,178 17 4
St. Joseph's, Wellington ..	268 16 0	20 1 8	248 14 4
St. Mary's, Nelson	1,342 19 6	316 18 11	1,026 0 7
St. Vincent de Paul's, Dunedin	90 15 6	18 13 0	72 2 6
Totals	3,007 5 0	481 10 3	2,525 14 9

During 1902, inmates were maintained in eight other institutions, and the expenditure on this account was as follows: Mission Home, Jerusalem, Wanganui (Mother Aubert's), £49 9s. 2d.; St. Mary's Home, Richmond, Christchurch, £62 18s. 1d.; Female Refuge Home, Christchurch, £8; Mount Magdala, Christchurch, £245 14s.; Levin Memorial Home, Wellington, £18 17s.; St. Mary's Home, Karori, £35 14s.

In the Government schools the policy is to board out all children of suitable age and character. The authorities of the private schools do not adopt the boarding-out system.

The total number of inmates of the private and Government industrial schools is given for the years 1901 and 1902, and the variations in the numbers boarded out, in residence, or at service:—

INMATES, 1901 AND 1902.

—	Boarded out.				In Residence.				At Service, &c.				Totals.			
	Dec., 1901.	Increase.	Decrease.	Dec., 1902.	Dec., 1901.	Increase.	Decrease.	Dec., 1902.	Dec., 1901.	Increase.	Decrease.	Dec., 1902.	Dec., 1901.	Increase.	Decrease.	Dec., 1902.
Government Schools—																
Auckland	48	9	..	57	19	..	1	18	30	1	..	31	97	9	..	106
Receiving Home, Wellington	39	35	..	74	2	..	1	1	28	..	3	25	69	31	..	100
Receiving Home, Christchurch	147	..	14	133	10	..	8	2	69	24	..	93	226	2	..	228
Burnham	..	2	..	2	115	..	12	103	166	..	..	166	281	..	10	271
Te Oranga Home, Christchurch	..	..	..	..	17	2	..	19	29	2	..	31	46	4	..	50
Caversham ..	184	..	10	174	130	10	..	140	194	23	..	217	508	23	..	531
Private Schools—																
St. Mary's, Auckland	..	..	..	..	96	..	6	90	34	10	..	44	130	4	..	134
St. Joseph's, Wellington	..	..	..	..	39	..	2	37	37	5	..	42	76	3	..	79
St. Mary's, Nelson ..	1	..	..	1	194	..	17	177	110	26	..	136	305	9	..	314
St. Vincent de Paul's, South Dunedin	..	..	..	..	19	4	..	23	8	3	..	11	27	7	..	34
Totals ..	419	46	24	441	641	16	47	610	705	94	3	796	1,765	92	10	1,847

Institute for the Blind.

The Jubilee Institute for the Blind is a private institution, and is not in any way under Government control, although it has received grants from time to time out of the Consolidated Revenue, and receives payment from the Education Department on account of pupils for whose tuition the department is responsible.

The payments made on behalf of such pupils to the Institute during the year 1902 amounted to £397 10s. 11d., towards which the parents contributed £54 9s. 6d. The number of pupils at the end of 1902 was twenty. Attendance is now compulsory for all blind children of school age and sound mind.

School for Deaf-mutes.

The roll of this school includes all the known deaf-mutes of school age and of sound intellect in the colony who have been brought under the notice of the Education Department.

The inclusion in the School Attendance Act of 1901 of provisions dealing with blind and deaf children marks an important step in the education of these unfortunate members of the community. Hitherto many parents, either through carelessness or wilfully, have neglected to send such children to the institutions maintained for their special instruction; but now the Minister of Education has the power to enforce attendance, due provision being made for a contribution by parents towards the cost of maintenance or for free admission where

parents are not in a position to contribute. The immediate consequence is an unusual increase in the number of candidates for admission to the Sumner School for Deaf-mutes. The number in residence at the end of 1902 was thirty-five boys and twenty-five girls, or seven boys and four girls more than at the end of 1901.

The method of instruction used at Sumner is the oral method, in favour of which there is a vast predominance of expert opinion.

As regards the adoption of that system, the Minister of Education in his annual report remarks. "It is a matter for congratulation that this colony from the first adopted the oral method of teaching, in which children are taught to converse by watching the lips of others. In America, where manual and mixed methods were at first largely in vogue, they are being rapidly discarded in favour of oral instruction, and New Zealand has accordingly been saved the expense and inconvenience of changing from inferior systems of deaf-mute education to that which is now almost universally admitted to be the best."

Sunday Schools.

These are treated of further on, the information being obtained as part of the Census results.

Subsidised Public Libraries, 1902–1903.

The number of libraries participating in the vote of £3,000 granted for subsidies shows a decrease of five as compared with the number aided in the previous year. In order that the purpose intended to be served by the vote may be attained, it is made a condition for participation that the whole of the subsidy granted to each library in the previous year shall have been expended in the purchase of books.

Education Districts.	Number of Libraries.	Income.	Amount on which Subsidy is calculated.	Amount of Subsidy.
		£ s. d.	£ s. d.	£ s. d.
Auckland	84	2,202 6 2	3,265 4 9	638 8 3
Taranaki	15	410 3 7	705 19 2	138 0 8
Wanganui	22	1,090 7 11	1,208 13 6	236 6 9
Wellington	18	2,923 0 6	1,006 4 2	196 13 10
Hawke's Bay	25	655 1 9	1,108 9 7	216 14 8
Marlborough	5	117 15 0	242 15 0	47 9 0
Nelson	27	604 16 7	1,171 3 9	228 19 3
Grey	5	169 5 0	294 5 0	57 10 10
Westland	5	95 14 9	220 14 9	43 2 10
North Canterbury ..	65	1,633 0 9	2,477 9 3	484 6 2
South Canterbury ..	18	505 10 1	843 4 7	164 16 7
Otago	50	887 19 3	1,957 13 0	382 13 10
Southland	24	204 16 9	804 16 9	157 6 10
Special grant to Chatham Islands	1	13 10 0	38 10 0	7 10 6
Totals ..	364	11,513 8 1	15,345 3 3	3,000 0 0

SECTION III.—LAW AND CRIME.

Civil Cases.

Sittings of the Supreme Court are held for trial of civil cases at Auckland, Gisborne, New Plymouth, Napier, Palmerston North, Wellington, and Wanganui, in the North Island; and at Blenheim, Nelson, Hokitika, Christchurch, Timaru, Oamaru, Dunedin, and Invercargill, in the Middle Island.

The number of writs of summons issued in the Supreme Court in 1902 was 488, against 485 in 1901, and 414 in 1900. The number of civil cases tried increased from 116 in 1901 to 167 in 1902. Of these last 36 were tried before common juries, 8 by special jury, and 123 by Judge without jury. The total of amounts for which judgments were recorded in 1902 was £23,259. There were 43 writs of execution issued during the year.

Forty-seven cases were commenced at ten District Courts in 1902. Sixteen of these cases were tried before juries, and 16 before a Judge only, making a total of 32 cases tried. Fourteen cases lapsed or were discontinued, and in 1 case judgment was pending. The total of amounts sued for was £7,776, and judgments were recorded for £1,587. Before the Magistrates' Courts 17,027 cases were tried, against 19,136 in 1901; the aggregate sum sued for during 1902 being £320,719, and the total for which judgment was given £159,133.

Court of Appeal.

Three Crown (criminal) cases were reserved from the superior Courts to be brought before the Court of Appeal in 1903. In all the cases the convictions were affirmed. There were appeals from 19 civil cases, of which 7 were allowed and 12 dismissed. Judgments were given on 10 other cases removed to the Court of Appeal.

Bankruptcy.

The petitions in bankruptcy during 1902 numbered 205, of which 181 were made by debtors and 24 by creditors. This number is 17 fewer than the number of petitions for the preceding year.

Of the bankruptcies in 1902: in 2 cases the liabilities were under £50; in 35, from £50 to £100; in 60, from £100 to £250; in 51, from £250 to £500; in 30, from £500 to £1,000; in 13, from £1,000 to £2,000; in 11, from £2,000 to £5,000; in 3, £5,000 and upwards.

The following gives the number of petitions, the total amount of the unsecured assets, the amount of debts proved, and the amount paid in dividends and preferential claims for the years 1896 to 1902:—

Year.	No. of Petitions in Bankruptcy.	Debtors' Statements of Assets, excluding Amounts secured to Creditors.	Amounts realised by Official Assignees.	Amount of Debts proved.	Amounts paid in Dividends and Preferential Claims.
		£	£	£	£
1896 ..	412	115,455	71,712	256,870	37,492
1897 ..	415	73,466	40,942	133,344	45,015
1898 ..	407	90,068	45,474	285,154	30,994
1899 ..	389	59,434	34,268	158,931	30,084
1900 ..	304	77,689	53,415	141,800	37,411
1901 ..	222	58,658	49,781	84,452	30,358
1902 ..	205	61,604	39,386	110,995	29,406

The degree to which private assignment of estates is resorted to cannot be ascertained.

Divorce.

In 1898 the Legislature of New Zealand passed a Divorce Act, and the signification of Her Majesty's assent thereto was duly notified by His Excellency the Governor in a Proclamation dated the 1st April, 1899, bringing the Act into operation from the 1st June of that year.

This Act places persons of either sex practically on an equality as regards petitions for dissolution of marriage; the same grounds, in substance, for a decree of divorce applying to man or woman.

Besides this important alteration of the law, the grounds for divorce are extended as under:—

1. Adultery, on either side.
2. Wilful desertion continuously during five years or more.
3. Habitual drunkenness on the part of husband, along with failing to support wife; or drunkenness and neglect, with unfitness to discharge household duties on the part of the wife.
4. Conviction, with sentence of imprisonment or penal servitude for seven years or upwards, for attempting to take life of petitioner.

Every decree for dissolution of marriage is in the first instance to be a decree *nisi*, not to be made absolute till after the expiration of such time, being not less than three months from the pronouncing thereof, as the Court shall by order from time to time direct.

The petitioner need not necessarily move to make absolute any decree *nisi* that may be pronounced.

A decree for a judicial separation may be obtained either by the husband or wife on the ground of adultery, or of cruelty, or of desertion without cause for a period of two years.

The petitions in 1902 under "The Divorce and Matrimonial Causes Act, 1867," were 138 in number, being 1 less than those for 1901: 136 were for dissolution of marriage, and 2 for judicial

separation; 91 decrees for dissolution of marriage were granted. The proceedings under the Act for the years 1896 to 1902, were as follows:—

Year.	Petitions for		Decrees for	
	Dissolution of Marriage.	Judicial Separation.	Dissolution of Marriage.	Judicial Separation.
1896	55	6	36	2
1897	48	10	33	1
1898	51	13	32	2
1899	112	1	46	16
1900	111	5	85	3
1901	138	1	103	1
1902	136	2	91	..

The Act of 1898 has evidently operated in the direction of increasing largely (but probably in the main temporarily) the number of petitions and decrees for dissolution of marriage or judicial separation.

The proportion of petitions and decrees for dissolution of marriage to the number of marriages was up till 1898 higher in New Zealand than in England and Wales, but lower than in New South Wales or Victoria. The full effect of the operation of the new law in New Zealand has now, however, to be experienced.

As early as 1889 an Act was passed in Victoria to allow of divorces being granted for wilful desertion, habitual drunkenness with cruelty or neglect, imprisonment under certain circumstances of either party, and adultery on the part of the husband. This multiplication of the causes for divorce has largely increased the proportion of decrees in that State.

An Act of a similar tenor was passed in New South Wales in 1892, and brought into working in August of that year, under which, and an amending Act of 1893, in addition to adultery since marriage on the part of the wife, and adultery and cruelty on the part of the husband, petitions for divorce can now be granted in that State on any of the following grounds:—

Husband *v.* wife: Desertion for not less than three years; habitual drunkenness for a similar period; refusing to obey an order for restitution of conjugal rights; being imprisoned under a sentence of three years or upwards; attempt to murder or inflict grievous bodily harm, or repeated assaults on him within one year previously.

Wife *v.* husband: Adultery, provided that at the time of the institution of the suit the husband is domiciled in New South Wales; desertion for not less than three years; habitual drunkenness with cruelty or neglect to support for the same period; refusing to obey an order for restitution of conjugal rights; being imprisoned for three years or upwards, or having

within five years undergone various sentences amounting in all to not less than three years; attempt to murder, or assault with intent to inflict grievous bodily harm, or repeated assaults within one year previously.

To entitle either party to seek relief on these grounds, he or she must have been domiciled in the State at the time of instituting the suit for three years or upwards, and should not have resorted to the State for the purpose of the suit. When a wife seeks for a decree on the ground of three years' desertion, if she was domiciled in New South Wales when the desertion commenced, she shall not be deemed to have lost her domicile by reason of her husband having thereafter acquired a foreign domicile.

The divorces in New South Wales and Victoria since the divorce law has been altered in the direction of increasing the grounds for decrees are as under. With these are given the figures for New Zealand under the old law up to 1898, and according to the new Act up to 1902. The figures for New South Wales tend to show that on altering the law there was a large accumulation of cases to get rid of, which increased the number of decrees to a degree which was not subsequently maintained.

Year.	New South Wales. Divorces.	Victoria. Divorces.	New Zealand. Divorces.
1893	306	85	25
1894	313	81	20
1895	301	85	18
1896	234	106	36
1897	246	117	33
1898	247	87	32
1899*	232	105	46
1900*	219	93	85
1901*	252	83	103
1902*	245	109	91

* Act of 1898 in force in New Zealand.

Criminal Cases.

Charges before Magistrates.

The number of charges heard before the Magistrates' Courts in 1902 was 28,527. Repeated charges against the same person are counted as distinct. Of the charges in 1902, 451 were against persons of the aboriginal native race, an increase of 11 on the number for the previous year.

If the Maoris be excluded, the number of charges (exclusive of lunacy) in 1902 is found to have been 28,076, an increase of 2,251 upon the number for 1901; and the proportion per 1,000 of population was 35·19, against 33·20 in 1901.

Persons charged with lunacy and committed to asylums have been excluded from the calculations for this and previous years shown, so that the figures now given will differ somewhat from those appearing in former issues of this book.

The figures, both numerical and proportional, covering a period of twenty-one years are subjoined :—

CHARGES BEFORE MAGISTRATES.

Year.	Number.	Proportion per 1,000 of Mean Population.	Year.	Number.	Proportion per 1,000 of Mean Population.
1882	21,622	42·45	1898	21,668	29·42
1885	22,297	38·89	1899	22,113	29·48
1888	18,370	30·35	1900	24,084	31·54
1891	16,714	26·54	1901	25,825	33·20
1894	16,820	24·76	1902	28,076	35·19
1897	19,390	26·87			

Summary Convictions, and Convictions in Superior Courts.

The summary convictions in 1902 numbered 22,455, including 330 Maoris. 802 persons, 37 of whom were Maoris, were committed for trial at the Supreme and District Courts, an increase of 46 on the number committed in 1901.

Dealing with the summary convictions, and convictions in the superior Courts, for all offences, the figures for 1898 and onwards (excluding the Maoris) are :—

Years.	SUMMARY CONVICTIONS. Number.	SUMMARY CONVICTIONS. Proportion per 1,000 of Mean Population.	CONVICTIONS IN SUPERIOR COURTS. Number.	CONVICTIONS IN SUPERIOR COURTS. Proportion per 1,000 of Mean Population.
1898—				
Offences against the person	690	0·94	53	0·07
Offences against property ..	1,565	2·13	284	0·39
Other offences	13,917	18·90	14	0·02
Totals	16,172	21·97	351	0·48
1899—				
Offences against the person	678	0·90	79	0·11
Offences against property ..	1,549	2·07	273	0·36
Other offences	14,583	19·44	24	0·03
Totals	16,810	22·41	376	0·50
1900—				
Offences against the person	724	0·95	79	0·10
Offences against property ..	1,476	1·93	271	0·35
Other offences	16,285	21·33	19	0·02
Totals	18,485	24·21	369	0·47
1901—				
Offences against the person	778	1·00	91	0·12
Offences against property ..	1,736	2·23	213	0·27
Other offences	17,812	22·90	24	0·03
Totals	20,326	26·13	328	0·42
1902—				
Offences against the person	540	0·68	82	0·10
Offences against property ..	1,759	2·20	223	0·28
Other offences	19,826	24·85	29	0·04
Totals	22,125	27·73	334	0·42

Including 5 Maoris, the convictions in the superior Courts numbered 339 (persons). Particulars of sentences for these higher Courts, and of the punishments consequent on summary convictions in the lower Courts, are appended in two tables:—

TABLE SHOWING THE SENTENCES OF CRIMINALS TRIED AND CONVICTED IN THE SUPREME AND DISTRICT COURTS DURING FIVE YEARS.

Punishments.	1898.	1899.	1900.	1901.	1902.
Death	3	..	1	1	..
Imprisonment with or without hard labour..	286	306	286	272	253
Fined	19	2	2	17	9
Imprisonment with whipping	2	2	2	1	..
Released under "The First Offenders' Probation Act, 1886"	50	61	74	51	63
Held to bail, or awaiting pleasure of Court ..	21	12	25	12	12
Sent to lunatic asylum	3	..	..	..	..
Sent to industrial school	2	..	1	..	2
Totals	*386	†383	‡391	§354	‖339

*Including 35 Maoris. †Including 7 Maoris. ‡Including 22 Maoris. §Including 26 Maoris. ‖Including 5 Maoris.

TABLE SHOWING THE PUNISHMENTS INFLICTED CONSEQUENT ON SUMMARY CONVICTIONS DURING FIVE YEARS.

Punishments.	1898.	1899.	1900.	1901.	1902.
Fine	8,149	8,229	9,206	9,905	11,471
Imprisonment in lieu of fine ..	1,410	1,762	1,895	1,910	1,874
Peremptory imprisonment ..	1,616	1,683	1,723	1,948	1,734
Recognisance	111	118	121	105	123
Whipping	18	28	15	20	35
Other	4,868	4,990	5,525	6,438	6,888
Totals	16,172	16,810	18,485	20,326	22,125

N.B.—Maoris have been excluded from this table.

Drunkenness.

Excluding Maoris, the proportion of convictions for drunkenness per 1,000 of population was 7·41 in 1898, 8·26 in 1899, 9·50 in 1900, 10·32 in 1901, and 10·34 in 1902. The number of convictions to which the proportions for the years 1898 to 1902 relate were as under:—

Year.	Number.	Year.	Number.
1898	5,458	1901	8,032
1899	6,194	1902	8,244
1900	7,252		

The totals of charges for drunkenness for the same years were:—

Year.	Number.	Year.	Number.
1898	5,559	1901	8,086
1899	6,279	1902	8,311
1900	7,319		

Among the New-Zealand-born population of European descent there is evidence of less drunkenness than among persons who have come to the colony from abroad. At the census of 1901, out of the total population of New Zealand over 15 years of age, 51·85 per cent. were found to have been born here; while the proportion of the convictions for drunkenness of New-Zealand-born Europeans to the total convictions was in the year 1900 about 17 per cent. only.

During the five years, 1898 to 1902 inclusive, the consumption of beer in the colony per inhabitant would seem to have increased, the proportion having been 8 gallons in the earlier year, against 8·8 gallons in the later one. Excluding the Maoris, the same result is found to obtain, the figures being 8·4 for the year 1898 and 9·3 for 1902. Wine and spirits also show an increase in the consumption per head of population.

The following calculations are made to show the results, including and excluding Maoris:—

CONSUMPTION OF BEER, WINE, AND SPIRITS PER HEAD OF POPULATION (INCLUDING AND EXCLUDING MAORIS).

	Including Maoris.			Excluding Maoris.		
	Beer. Gal.	Wine. Gal.	Spirits. Gal.	Beer. Gal.	Wine. Gal.	Spirits. Gal.
1898	7·995	0·139	0·634	8·427	0·146	0·668
1899	8·150	0·141	0·653	8·583	0·148	0·687
1900	8·696	0·145	0·684	9·150	0·152	0·720
1901	8·919	0·151	0·726	9·413	0·159	0·766
1902	8·777	0·150	0·716	9·252	0·158	0·755

The actual quantities of beer, wine, and spirits used in the colony were, for the five years:—

	Beer for Consumption. Gals.	Wine for Consumption. Gals.	Spirits for Consumption. Gals.
1898 ..	6,204,700	107,595	491,846
1899 ..	6,437,140	111,049	515,384
1900 ..	6,986,900	116,188	549,932
1901 ..	7,323,290	123,592	596,071
1902 ..	7,380,883	126,450	602,021

In Australia the consumption per head of alcoholic liquors is greater than it is here. The average for three years, according to Mr. Coghlan, is quoted below:—

	Spirits. Gal. Per Head.	Wine. Gal. Per Head.	Beer. Gal. Per Head.
New South Wales	0·88	0·66	10·75
Victoria	0·79	1·22	12·70
Queensland	1·03	0·38	11·14
South Australia	0·48	1·29	8·99
Western Australia	1·55	0·87	25·83
Tasmania	0·51	0·16	9·18
New Zealand	0·75	0·16	9·27

In each of these States, with the exception of Tasmania and South Australia, charges for drunkenness are, in proportion to

population, far more numerous than in New Zealand. The order of the States for the year 1900 in this respect is, to quote from the same authority, as under :—

CHARGES OF DRUNKENNESS IN PROPORTION TO POPULATION.

Queensland	19·02 per 1,000
Western Australia	15·56 „
New South Wales	15·39 „
Victoria	14·43 „
New Zealand	12·35 „

"The Inebriates Institutions Act, 1898."

Under this law, the Governor in Council may direct that any building or establishment which is the property of the Crown shall be an institution for inebriates: and he may appoint superintendents, with other officers.

Power is also given to make regulations for the management, supervision, and inspection of these institutions, any of which may be separated into two divisions, with different scales of accommodation, and fees to be paid by patients.

An inebriate may himself make application to a Judge or Magistrate for an order committing him to an institution. Or, if the husband, wife, or any relation or friend of any inebriate applies, the Judge or Magistrate may summon the inebriate to show cause why he should not be committed; when, if necessary, he may be compulsorily dealt with.

There are penalties for improper treatment of patients, and a patient is also liable if misconducting himself. It is also enacted that, during the continuance of an order, an escaped inebriate may be retaken.

An amendment Act of 1903 authorises the separation of curable inebriates from those deemed to be incurable, and the establishment of institutions for the reception of curable inebriates only.

A home has been established at Waitati, near Seacliff.

Crime amongst Maoris

The Native population of the colony has hitherto been regarded as stationary, and comparisons of the numbers of summary convictions by the higher and lower Courts are given. The number for 1897 is swelled by 108 persons convicted of trespass. The figures relating to the convictions by the superior Courts are small and fluctuating, the proportionately large increase in 1898 being caused by the inclusion of sixteen convicted of conspiring to prevent the collection of taxes.

SUMMARY CONVICTIONS OF MAORIS.

Year.	Number.	Year.	Number
1891	298	1897	450
1892	293	1898	349
1893	253	1899	300
1894	321	1900	253
1895	316	1901	298
1896	332	1902	330

CONVICTIONS OF MAORIS IN SUPERIOR COURTS.

Year.	Convictions.	Number of Persons convicted.	Year.	Convictions.	Number of Persons convicted.
1891	7	7	1897	16	12
1892	16	15	1898	21	35
1893	13	12	1899	8	7
1894	25	24	1900	22	22
1895	17	51	1901	26	26
1896	19	19	1902	5	5

Prisoners in Gaol.

The total number of prisoners received in the different gaols of the colony during the year 1902 was 4,050, including persons awaiting trial but not convicted within the year, and counting as distinct persons repeated admissions of the same person, as well as transfers from gaol to gaol of convicts undergoing sentence. In 1901 the number received was 4,302, so that the figures for 1902 show a decrease of 252. Of 4,050 admissions for 1902, 10 were for debt, and 43 on account of lunacy; while 117 were Maoris imprisoned for various offences. If the debtors, lunatics, and Maoris be excluded, the number of persons received into gaol is reduced to 3,880, against 4,094 in 1901.

The number of persons in gaol (including Maoris) at the end of the year 1902 was 653, or 60 less than in 1901.

PRISONERS IN GAOL (31ST DECEMBER).

Year.	Undergoing Sentence.	Debtors and Lunatics	On Remand and awaiting Trial.	Total.
1889	611	3	19	633
1891	494	4	36	534
1893	463	6	33	502
1895	531	5	46	582
1897	623	..	51	674
1899	508	..	58	566
1900	527	..	41	568
1901	661	1	51	713
1902	602	..	51	653

Of the prisoners previously convicted received in 1902, 379 men and 41 women had been convicted once; 253 men and 34 women twice; 929 men and 346 women three or more times: making a total of 1,561 men and 421 women.

Besides the returns from the Prisons Department, a separate card for each admission is furnished for every gaol. Such cards as show convictions are arranged alphabetically according to name of prisoner, and where several are found referring to the same person, all are thrown out but one; then the number of cards retained equals the actual number of distinct convicted prisoners received in the various gaols during the year. In 1902 this number (excluding Maoris) was 2,396, an increase of 51 on the number in 1901. These figures do not include children committed to the industrial schools simply on the ground that they are neglected or destitute.

The following table shows the number of distinct persons (exclusive of Maoris) received into gaol after conviction during 1902, classified according to nature of offence, religion, birthplace, and age:—

Distinct convicted Prisoners received into Gaol, 1902.

[Note.—In this table a prisoner convicted of more than one offence during the year is reckoned once only, under the heading of the principal offence—*e.g.*, a prisoner convicted three times of drunkenness, twice of vagrancy, and once of theft, is counted only once, under the heading "Theft." Debtors and lunatics received into gaol, and children committed to the industrial schools not convicted of any crime, are omitted.]

	Offences against the Person.				Offences against Property.				Miscellaneous.						Totals.	
	Convicted on Indictment.		Summarily convicted.		Theft and Deceit.		Mischief.		Vagrancy.		Drunkenness.*		Other Offences.			
	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.
Religions—																
Church of England	26	1	52	2	291	15	15	1	101	24	235	39	188	5	908	87
Roman Catholic	20	1	41	1	176	7	23	1	80	33	189	52	160	6	689	101
Presbyterian	5	1	18	1	78	7	11	...	51	9	114	24	87	1	364	43
Wesleyan	3	1	5	...	23	1	4	...	4	1	20	3	21	1	80	7
Others	4	...	6	...	36	1	2	...	14	2	28	2	22	...	112	5
Totals	58	4	122	4	604	31	55	2	250	69	586	120	478	13	2,153	243
Birthplaces—																
England and Wales	17	...	24	2	154	4	14	1	78	13	204	32	137	2	628	54
Scotland	4	...	12	...	54	3	5	...	29	8	93	9	58	...	255	20
Ireland	8	...	17	...	61	7	10	1	50	14	124	43	61	1	331	66
New Zealand	17	4	44	2	245	14	20	...	58	28	85	23	134	7	603	78
Australian States	7	...	6	...	42	2	3	...	13	5	28	8	41	1	140	16
Other British possessions	...	...	2	...	7	1	...	...	4	...	6	2	10	1	29	4
China	...	...	...	...	2	...	1	...	1	...	...	...	1	...	5	...
Other countries	5	...	17	...	39	...	2	...	17	1	46	3	36	1	162	5
Totals	58	4	122	4	604	31	55	2	250	69	586	120	478	13	2,153	243
Ages—																
Under 10 years	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
10 and under 12 years	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...	...
12 and under 15 years	...	...	...	...	2	...	...	...	...	...	...	...	...	...	2	...
15 and under 20 years	2	...	1	...	73	4	6	...	...	1	3	...	17	...	102	5
20 and under 25 years	8	1	36	1	124	6	8	...	27	4	42	4	104	2	349	18
25 and under 30 years	7	1	26	1	110	4	8	...	28	12	60	10	86	1	325	29
30 and under 40 years	17	2	30	2	156	4	10	...	53	21	137	36	116	5	519	70
40 and under 50 years	10	...	18	...	83	5	12	1	55	19	150	35	78	3	406	63
50 and under 60 years	8	...	6	...	44	6	8	1	45	12	114	21	50	2	275	42
60 years and over	6	...	5	...	12	2	3	...	42	...	80	14	27	...	175	16
Totals	58	4	122	4	604	31	55	2	250	69	586	120	478	13	2,153	243
Totals, 1901	81	7	139	6	542	29	40	4	248	110	542	115	475	7	2,067	278

* It must be remembered that drunkenness is punished more by fine than by imprisonment, so that the figures in the gaol tables do not represent the full number of persons punished for that offence.

The number of distinct persons (exclusive of Maoris) imprisoned after conviction, in the past thirteen years, counting one offence only when the same person was imprisoned more than once, with the proportion per 10,000 persons living, is added:—

Distinct Persons imprisoned after Conviction.

Year	Prisoners.	Proportion per 10,000 of Population.	Year.	Prisoners.	Proportion per 10,000 of Population.
1890	2,397	38·61	1897	1,884	25·84
1891	2,113	33·55	1898	1,982	26·92
1892	2,164	33·69	1899	2,125	28·33
1893	2,111	31·92	1900	2,116	27·71
1894	1,955	28·78	1901	2,345	30·14
1895	1,930	27·87	1902	2,396	30·03
1896	1,936	27·11			

There has been since 1890 a reduction of 8·58 per 10,000 in the proportion to population. In New South Wales the proportion for 1898 was 66 per 10,000 persons.

It must be understood that the actual number of imprisonments was much in excess of the figures given, as many persons were several times imprisoned, either for offences differing in kind or for repetitions of the same offence. Thus, persons returned as imprisoned for larceny underwent other imprisonments for drunkenness, &c. Some returned as convicted of drunkenness were several times in gaol during the year for the same offence, or for another, such as assault, riotous or indecent conduct, &c. Often there were several charges preferred against the same person at the one time, of which the most serious followed by conviction has been selected.

The proportions in every 100 distinct convicted prisoners belonging to each of the four principal religious denominations, with proportions of prisoners at each age-period, and particulars as to birthplaces and ages, will be found in the Statistical Volume for 1902, on pages 502 and 505.

Cost of Prisoners.

The prisoners in gaols during the year 1902 were maintained at a net cost to the State of £24 16s. 4d. per head, against £26 14s. 1d. in 1901.

Crime amongst the New-Zealand-born.

While the New-Zealand-born formed at the last census 67 per cent. of the whole population of the colony, they contributed in 1902 only 28 per cent. of the prisoners received in gaol. Of the New-Zealand-born population, however, a large number are under 15 years of age, a period of life at which there are very few prisoners; and, therefore, another comparison is necessary. It is found that the New-Zealand-born over 15 years formed 52 per cent. of the total population above that age; but, as before stated, New-Zealanders constituted only 28 per cent. of the total number received in gaols.

The total number of New-Zealand-born distinct prisoners (excluding Maoris) received for the year 1902—681 persons—is found to be 35 in excess of the number for 1901. Of those received in 1902, 84 were under twenty years of age. As before stated, the plan adopted in preparing the foregoing tables is to count each prisoner only once, and to exclude all who are not convicted prisoners, besides dealing only with the number received during the year, instead of with the full number in gaol, which would, of course, include those brought forward from the previous year. The comparative results for a series of years given by this method are held to be more valuable than those brought out by one which includes prisoners merely awaiting trial, and continual repetitions of the same individuals.

Remarks by the Inspector of Prisons.

In his report of the year 1903, the Inspector of Prisons thus comments on the work of the tree-planting prison at Waiotapu, the establishment of which was mentioned in previous Year-books:—

The tree-planting prison camp at Waiotapu has now got beyond an experiment, and is turning out a great success. There are at present 41 prisoners there and 4 officers. For the nature of the work done there, reference is directed to the extracts from the report of the Gaoler attached. There have been no punishments, and it has been only necessary to remove 3 prisoners for grumbling; while, on the other hand, there have been numerous requests to be sent there, and those prisoners who are there have certainly done good work. The class of prisoners suitable for such camp life is of course limited, but it is intended to establish shortly a similar establishment for a like purpose at Hanmer, which will take all suitable prisoners from Wellington and the South Island prisons, while Waiotapu can be made available for prisoners from the North Island with the exception of Wellington; and another party for tree-planting is likely to be sent to Somes Island this season.

First Offenders' Probation Act.

One hundred and twenty-seven persons were placed on probation in the year 1902, as against 97 in 1901. Of these, 24 were discharged after satisfactorily carrying out the conditions of their licenses, 6 were rearrested, and 97 remained under the supervision of Probation Officers.

Of the 1,456 persons placed on probation since the introduction of the Act in October, 1886, no less than 1,199 had, by the end of the year 1902, been discharged after satisfactorily carrying out the conditions of their licenses, 91 have been rearrested and sentenced to various terms of imprisonment, 1 committed suicide, 1 died, 34 absconded, 1 was sent to a lunatic asylum, and 129 remained fulfilling the conditions of their terms of probation.

The amount of costs which the various Courts directed to be paid during the year 1902 was £436 19s., of which £209 1s. has been actually paid. The approximate cost of keeping these first offenders had they been sent to prison would have amounted to £4,523, which sum, added to the amount of costs, &c., actually paid, represents a saving of £4,732 1s.

Inquests.

The number of bodies on which inquests were held in 1902 was 1,038, including 42 Maoris. In 785 cases the bodies were of males, and in 253 of females.

The inquests on suicidal deaths in 1902 show a decrease on the number for the previous year. The figures for each of the last six years were :—

Year.	Inquests on Suicides.			Year.	Inquests on Suicides.		
	Males.	Females.	Total.		Males.	Females.	Total.
1897 ..	42	11	53	1900 ..	52	11	63
1898 ..	69	8	77	1901 ..	71	13	84
1899 ..	61	13	74	1902 ..	69	5	74

The verdicts given at the inquests held in 1902 may be classified as under :—

Nature of Verdict.	Inquests on Persons.		
	Males.	Females.	Total.
Accident	357	75	432
Disease and natural causes ..	326	167	493
Intemperance	10	1	11
Homicide	3	3	6
Suicide	69	5	74
Execution	..	..	..
Not classed	20	2	22
	785	253	1,038

Of the accidental deaths, drowning is the most fatal form. The verdicts show that 137 bodies were found drowned, giving a percentage of 31·71 on the accidental deaths from all causes.

Fire Inquests.

The inquests on fires held during 1902 numbered 24. In five cases the verdict was incendiarism; in two, accident; in three there was not sufficient evidence to show cause; and in fourteen no evidence was forthcoming.

SECTION IV.—IMPORTS: CUSTOMS AND EXCISE REVENUE.

Imports.

The quantities and values of imports used in making up the figures given in this portion of the statistical information are obtained from Customs entries, verified where necessary, as with goods subject to an *ad valorem* duty, by examination. In estimating the value of imports, *ad valorem* goods are taken at their *invoice* value increased by 10 per cent., and include the value of case, cask, or covering (sec. 39, "Customs Laws Consolidation Act, 1882"). Value of all other goods includes freight and charges to time of arrival at port of discharge. Goods transhipped at a foreign port are regarded as imported from the country where they were originally shipped. The countries named, however, may not be those of origin, as no attempt is made to trace the goods beyond the ports disclosed by the documents presented to the Customs. Very little cargo *in transitu* passes through New Zealand.

The total declared values of the imports in 1903 amounted to £12,788,675, being an increase on the corresponding total in 1902 of £1,461,952. These figures, however, include specie. The value of coin brought into the colony in 1903 was £712,716, against £368,685 in the previous year, and if these amounts are excluded, the increase on the values of all other articles will be only £1,117,921.

The value of imports for each of the past sixteen years was:—

Year.	Imports, inclusive of Specie. £	Imports, exclusive of Specie. £
1888	5,941,900	5,430,050
1889	6,308,863	5,980,583
1890	6,260,505	5,928,625
1891	6,503,849	6,431,101
1892	6,943,056	6,742,544
1893	6,911,515	6,494,279
1894	6,788,020	5,990,177
1895	6,400,129	6,115,953
1896	7,137,320	7,035,379
1897	8,055,223	7,994,201
1898	8,230,600	8,211,409
1899	8,739,633	8,613,656
1900	10,646,096	10,207,326
1901	11,817,915	11,353,416
1902	11,326,723	10,958,038
1903	12,788,675	12,075,959

In 1901 the Government imported railway plant valued at half a million sterling, against far smaller quantities introduced in 1902 and 1903.

It will be seen that the value of imports, exclusive of specie, rose from £5,430,050 in 1888 to £6,742,544 in 1892, then fell to £5,990,177 in 1894, after which there ensued a steady advance year by year to £11,353,416 in 1901, with a substantial increase in 1903. The movement for 1894–1903 shows that the imports have more than doubled in value during that period. In quantities of various imports the increases vary, and full particulars of every kind of article imported in 1903 are to be found in detail further on, which may be critically examined with those in similar tables given in the previous Year-books.

The degree of expenditure of loan moneys raised abroad by the general and local Governments somewhat affects the question when considering the rise of imports. And, when consulting the figures relating to expenditure out of loan accounts, the matter of aids from the Consolidated Fund (which are included) presents itself, besides other features in connection with this subject.

The expansion of imports is still further to be considered in connection with the condition of the manufactures of the colony, for an increase of imports arising from a decline of internal manufactures would scarcely be regarded as a satisfactory position. But there has been great development of the manufactures of New Zealand since 1895, not only in the great primary industries, but throughout.

It is desirable to consider not only the total value of the import trade for different years by comparing figures, but to ascertain the rates *per capita* of population, to judge whether the imports are relatively greater or less than they have been. The fairest comparisons are from calculations made after deducting specie imported, for in the year 1894, as an instance, no less than £797,843 was brought to the colony in coin, and last year (1903) the amount was £712,716. The figures for each year from 1888 stand thus:—

Years.	Imports per head of mean Population, excluding Maoris.	
	Including Specie.	Excluding Specie.
	£ s. d.	£ s. d.
1888	9 16 4	8 19 5
1889	10 5 6	9 15 6
1890	10 0 2	9 11 0
1891	10 6 6	10 4 3
1892	10 16 3	10 9 11
1893	10 9 0	9 16 5
1894	9 19 11	8 16 5
1895	9 4 10	8 16 8
1896	10 1 11	9 19 1
1897	11 3 3	11 1 7
1898	11 3 7	11 3 1
1899	11 13 1	11 9 8
1900	13 18 10	13 7 4
1901	15 3 10	14 11 11
1902	14 3 11	13 14 8
1903	15 11 10	14 14 5

Using the figures exclusive of the specie, it will be seen that, though comparisons for years since 1888 do not show by any means a steady rise since that year, the position is, that whereas the imports proper were only £8 19s. 5d. per head of population in the first period of the table, they had increased by £5 15s. per head in 1903, and, with the exception of 1902, increase is observed in each year's figures since 1894.

By means of the accompanying table, in which the articles imported are arranged in groups according to their nature, the increases in value can be traced to their specific heads :—

IMPORTS FOR FIVE YEARS.

Group of Principal Articles imported.	1899.	1900.	1901.	1902.	1903.
	£	£	£	£	£
Apparel and slops ..	393,689	451,879	463,194	511,397	582,997
Boots and shoes ..	151,593	194,811	211,215	202,931	245,639
Cotton piece-goods ..	447,495	514,607	470,568	498,485	556,564
Drapery	395,696	438,299	443,863	449,503	511,717
Haberdashery ..	84,808	95,401	110,746	102,569	118,049
Hats and caps ..	68,184	66,799	70,013	75,222	77,853
Hosiery	90,545	103,291	101,481	115,071	125,618
Linen manufactures ..	69,167	83,206	89,915	71,170	94,794
Millinery	36,932	43,313	43,380	45,701	60,503
Silks	87,639	97,922	121,937	139,522	128,223
Woollens	297,387	330,713	348,666	393,033	436,161
Totals.. ..	2,123,135	2,420,241	2,474,978	2,604,604	2,938,118
Agricultural implements	17,063	13,508	10,744	11,518	9,001
Cutlery	19,764	23,089	27,149	29,993	27,160
Hardware and iron-mongery	255,701	330,314	315,239	334,965	355,562
Rails and railway bolts, &c.	63,557	118,464	148,344	85,163	131,592
Iron and steel, other, pig, wrought, wire, &c.	632,182	865,361	682,906	815,260	795,758
Machinery	405,551	536,429	600,019	561,649	642,075
Nails	31,363	48,050	40,034	44,114	39,440
Railway plant ..	63,807	63,128	514,511	122,303	122,164
Sewing-machines ..	30,801	37,429	38,227	37,005	51,095
Tools, artificers' ..	59,066	77,447	84,523	88,273	98,076
Totals ..	1,578,855	2,113,219	2,461,696	2,130,243	2,271,923
Sugar	354,925	451,522	489,936	402,138	441,843
Tea	183,691	199,934	219,089	197,127	204,236
Totals.. ..	538,616	651,456	709,025	599,265	646,079

IMPORTS FOR FIVE YEARS—*continued.*

Group of Principal Articles imported.	1899.	1900.	1901.	1902.	1903.
	£	£	£	£	£
Beer	39,166	34,296	34,949	43,627	38,620
Spirits*	215,685	198,282	243,824	235,369	246,263
Tobacco	184,173	198,861	221,889	212,634	260,478
Wine	51,640	55,098	63,837	60,350	57,560
Totals	490,664	486,537	564,499	551,980	602,921
Paper	135,482	174,111	184,986	181,486	212,541
Printed books	132,260	136,891	140,347	149,194	171,672
Stationery	100,875	96,408	113,422	112,676	136,968
Totals	368,617	407,410	438,755	443,356	521,181
Arms, ammunition, and explosives	91,118	111,859	201,683	129,733	138,146
Bags and sacks	123,596	141,810	214,987	135,674	109,040
Bicycles and tricycles	57,616	50,417	54,057	52,633	71,082
Bicycles and tricycles, fittings for	54,999	68,228	71,173	81,544	90,487
Coals	92,815	120,406	151,334	125,732	158,143
Drugs, chemicals, and druggist's wares	186,598	187,821	212,430	240,841	261,864
Fancy goods	110,114	128,339	145,356	148,072	177,227
Fruits (including fresh, preserved, bottled, dried)	180,590	226,128	248,985	175,366	233,382
Glass and glassware	104,524	111,847	133,434	138,908	145,059
Manures	116,395	112,287	134,186	154,964	120,711
Musical instruments	86,405	97,678	116,396	110,663	113,849
Oils	126,967	206,770	238,396	251,415	248,859
Timber	83,084	104,927	179,152	146,561	163,497
Other imports (excluding specie)	2,098,948	2,459,946	2,602,894	2,736,484	3,064,391
Total Imports (excluding specie)	8,613,656	10,207,326	11,353,416	10,958,038	12,075,959
Specie imported	125,977	438,770	464,499	368,685	712,716
Total Imports	8,739,633	10,646,096	11,817,915	11,326,723	12,788,675

* Includes methylated and perfumed spirits, and spirits of wine.

Of £12,075,959 the total value of goods imported during 1903, the chief items were as under:—

Articles.	Value. £	Proportion per Cent.
Clothing, drapery, &c.	2,938,118	24·33
Metal, machinery, and implements	2,271,923	18·81
Tea and sugar	646,079	5·35
Wine, beer, spirits, and tobacco	602,921	4·99
Paper, books, and stationery	521,181	4·32
Other imports	5,095,737	42·20
	£12,075,959	100·00

The declared value of the clothing, drapery, &c., imported increased from £2,604,604 in 1902 to £2,938,118 in 1903. In 1899 the value of these imports was £2,123,135. The iron, machinery, and implements imported in 1903 were valued at £2,271,923, an increase of £693,068 on the corresponding figures for 1899 (£1,578,855). The value of sugar and tea imported in 1903 shows an increase, when compared with 1902, of £46,814. Beer, wine, spirits, and tobacco show an increase of £50,941, from £551,980 in 1902 to £602,921 in 1903.

To the total value of "Other imports (excluding specie)," in 1903 (£3,064,391), shown in the table above, patent medicines contributed a sum of £49,182; earthenware, £61,308; floorcloth and oilcloth, £86,242; furniture and upholstery, £72,457; cement, £75,148; leather and leather manufactures, £95,594; and seeds, £94,771.

Goods imported by means of the "Parcels post" system during 1903 were valued at £151,236.

Goods received from the Cook and other annexed Islands are now treated as New Zealand produce, and not as imports. The total in 1903 was valued at £38,708, and the principal articles of produce as follows: Bêche-de-mer, £33; limejuice, £1,060; raw coffee, £1,470; copra, £3,529; fruit, £26,009; candle-nuts, £464; cocoanuts, £490; shell, £2,800; hats, £2,613.

Value of Free and Dutiable Imports.

The values of the imports into New Zealand during the years 1902 and 1903 are given in the next table, classified according to the duties to which they were liable, and arranged so as to show the declared value of goods on which specific or *ad valorem* duties at various rates are payable, and of those admitted free of duty:—

Duties to which Imports liable.	Value of Imports, 1902.		Value of Imports, 1903.	
	£	£	£	£
Specific duties	..	2,395,274	..	2,613,361
Ad valorem duties—				
5 per cent.	176,607		187,112	
10 per cent.	226,994		251,659	
15 per cent.	177,041		206,961	
20 per cent.	2,496,376		2,765,964	
22½ per cent.	201,967		246,111	
25 per cent.	1,084,133		1,258,605	
30 per cent.	..		1,090	
33¾ per cent.	..		30	
37½ per cent.	..		162	
40 per cent.	1,166		814	
Various	1,584		1,502	
		4,365,868		4,920,010
Parcels-post (various) ..	..	123,912	..	151,236
Duty-free (excluding specie)	..	4,072,984	..	4,391,352
Specie imported	..	368,685	..	712,716
Totals	..	11,326,723	..	12,788,675

The proportions of free and dutiable goods imported during 1899, 1900, 1902, and 1903 are compared with similar figures for 1894, the year preceding that in which the altered tariff came into force:—

—	1894.	1899.	1900.	1902.	1903.
Merchandise—	£	£	£	£	£
Free	1,871,772	2,942,999	3,727,926	4,072,984	4,391,352
Dutiable	4,118,405	5,670,657	6,479,400	6,885,054	7,684,607
Imports (less specie)	5,990,177	8,613,656	10,207,326	10,958,038	12,075,959
	£	£	£	£	£
Total net duty received*	1,572,467	2,046,452	2,174,498	2,289,783	2,507,478
Duty, per cent. of imports—	Per Cent.	Per Cent.	Per Cent.	Per Cent	Per Cent.
(*a.*) On dutiable imports	38·18	36·09	33·56	33·26	32·63
(*b.*) On all merchandise	26·25	23·76	21·30	20·90	20·76

* Including excise duties levied on certain imports manufactured in bond.

Sugar.

The value of sugar (including glucose, molasses, and treacle) imported in 1903 was £441,843, an increase of £39,705 on the amount for 1902 (£402,138). The value of this import for the last three years has averaged only £444,639 per annum; but for the three years, 1882, 1883, and 1884, the average, with a much smaller population, was £615,207 for each year. The smaller average amount for the last three years is due, not so much to a reduction in the quantity imported as to the fall in the price of sugar, and partly to the fact that the proportion of refined to raw sugar has vastly decreased.

The following figures, giving the average consumption per head of sugar in Australasia, are, saving those for New Zealand—and excluding a proportion (30 lb. per head) deducted on account of Maoris—taken from Mr. Coghlan's "Statistical account of Australia and New Zealand, 1902–1903." The figures stating the consumption of tea, wine, beer, spirits, and tobacco, given further on, are also taken from the same source:—

Annual Consumption of Sugar per Head in Australasia.

	Lb.		Lb.
Queensland	128·9	South Australia	102·1
New Zealand	110·3	Tasmania	96·1
Western Australia	110·1	Victoria	95·0
New South Wales	109·0		

Tea.

The quantity of tea entered for consumption in 1903 was 5,232,721 lb. Supposing Maoris to use, on an average, 1 lb. per head per annum, the consumption of tea per head of the population, exclusive of Maoris, would be 6·3 lb. in 1903.

AVERAGE ANNUAL CONSUMPTION OF TEA PER HEAD IN AUSTRALASIA.

	Lb.		Lb.
Western Australia	9·9	Victoria	6·8
South Australia	8·3	New Zealand	6·3
New South Wales	7·7	Tasmania	6·2
Queensland	7·3		

BEER, SPIRITS, AND WINE.

During 1903 excise duty was paid on 7,555,200 gallons of beer; and 204,126 gallons of beer, 619,649 gallons of spirits, and 122,490 gallons of wine were entered at the Customs for home consumption.

The actual quantity of beer made and used in the colony has increased from 4,243,760 gallons in 1886 to 7,555,200 gallons in 1903:—

BEER MANUFACTURED IN NEW ZEALAND ON WHICH EXCISE DUTY WAS PAID.

	Gal.		Gal.
1886	4,243,760	1895	4,936,400
1887	4,264,160	1896	5,382,960
1888	4,050,560	1897	5,741,200
1889	4,402,480	1898	6,013,120
1890	4,676,240	1899	6,261,200
1891	4,567,920	1900	6,811,280
1892	4,752,720	1901	7,134,800
1893	4,873,600	1902	7,179,360
1894	4,807,360	1903	7,555,200

The following table gives the consumption per head of alcoholic liquors by the people, excluding and including Maoris, showing separately the proportions of beer, wine, and spirits from 1883 to 1903. To the amount of beer manufactured in the colony in each year on which excise duty was paid has been added the amount brought into consumption from imports:—

Year.	Beer.		Spirits.		Wine.	
	Excluding Maoris.	Including Maoris.	Excluding Maoris.	Including Maoris.	Excluding Maoris.	Including Maoris.
	Gal.	Gal.	Gal.	Gal.	Gal.	Gal.
1883	9·435	8·709	1·088	1·005	0·315	0·291
1886	7·861	7·333	0·820	0·765	0·212	0·198
1889	7·624	7·136	0·598	0·560	0·176	0·165
1892	7·807	7·328	0·708	0·664	0·174	0·163
1895	7·421	6·996	0·629	0·593	0·135	0·127
1898	8·427	7·995	0·668	0·634	0·146	0·139
1899	8·583	8·150	0·687	0·653	0·148	0·141
1900	9·150	8·696	0·720	0·684	0·152	0·145
1901	9·413	8·919	0·766	0·726	0·159	0·151
1902	9·252	8·777	0·755	0·716	0·158	0·150
1903	9·460	8·987	0·755	0·718	0·149	0·142

A comparison of the average annual consumption of beer, spirits, and wine per head in Australasia is added :—

—	Beer.	Spirits.	Wine.	—	Beer.	Spirits.	Wine.
	Gal.	Gal.	Gal.		Gal.	Gal.	Gal.
Queensland ..	11·14	1·03	0·38	Western Australia	25·83	1·55	0·87
New South Wales	10·75	0·88	0·66	Tasmania ..	9·18	0·51	0·16
Victoria ..	12·70	0·79	1·22	New Zealand (including Maoris)	9·27	0·75	0·16
South Australia ..	8·99	0·48	1·29				

Tobacco.

The tobacco entered for consumption in 1903 was 2,164,244 lb., and the consumption per head of population, including Maoris, 2·51 lb.

Average Annual Consumption per Head of Tobacco in various Countries.

	Lb.		Lb.
Holland	6·92	New Zealand	2·51
Western Australia	4·81	Victoria	2·22
United States	4·40	Canada	2·11
Turkey	4·37	Tasmania	2·05
Austria-Hungary	3·77	France	2·05
Denmark	3·70	South Australia	2·00
Switzerland	3·24	Sweden	1·87
Belgium	3·15	Spain	1·70
Germany	3·00	United Kingdom	1·41
Queensland	2·97	Italy	1·34
New South Wales	2·70	Russia	1·23

Imports from Different Countries.

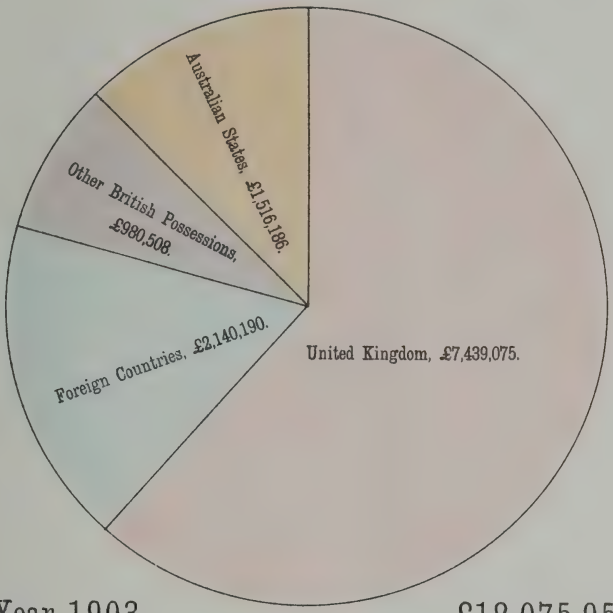
The imports from the United Kingdom to New Zealand in 1903 were valued at £7,512,668, an increase of £661,216 on the value of goods imported from the Home-country during the previous year. From British colonies and possessions the imports were £3,135,474, an increase of £565,969 on the amount in 1902.

Figures for ten years are given, showing that imports from British possessions only increased by 72·20 per cent., whereas those from foreign States advanced at the far higher rate of 254·16 per cent., mainly in consequence of the development of inwards trade with the United States of America, about which full particulars will be found further on :—

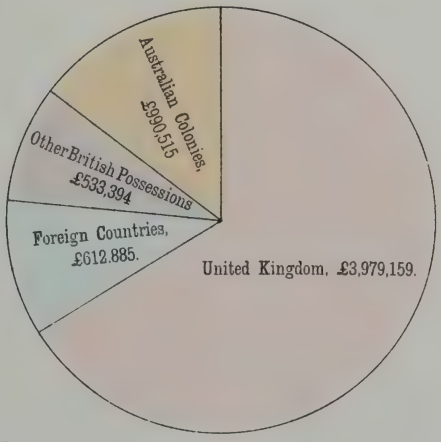
	Imports from		
	United Kingdom.	British Colonies and Possessions.	Foreign States.
	£	£	£
1894	3,949,770	2,233,860	604,390
1895	3,992,359	1,794,849	612,921
1896	3,714,476	1,628,661	794,183
1897	5,392,738	1,662,985	999,500
1898	5,148,833	1,927,817	1,153,950
1899	5,526,645	2,036,797	1,176,191
1900	6,504,484	2,625,372	1,516,240
1901	6,885,831	2,913,866	2,018,218
1902	6,851,452	2,569,505	1,905,766
1903	7,512,668	3,135,474	2,140,533

IMPORTS.

RISE IN VALUE OF IMPORTS TO NEW ZEALAND (EXCLUSIVE OF SPECIE), 1895-1903.



Year 1903. £12,075,959.



Year 1895. £6,115,953.

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The following are the values of imports from different countries or places in 1903 and 1902, given in the order of the increase or decrease from each :—

Country, Colony, State, &c.	1903. £	1902. £	Increase. £
United Kingdom	7,512,668	6,851,452	661,216
New South Wales	1,229,127	871,593	357,534
Fiji	461,988	327,972	134,016
United States of America	1,441,358	1,318,937	122,421
Victoria	816,003	748,313	67,690
Germany	274,297	210,560	63,737
Belgium	133,140	86,236	46,904
Japan	86,192	56,087	30,105
Western Australia	33,176	7,336	25,840
Ceylon	138,959	125,891	13,068
Canada	46,120	33,516	12,604
Sumatra	11,026	..	11,026
Italy	20,501	11,129	9,372
Greece	21,839	14,097	7,742
Asia Minor	22,787	15,250	7,537
France	42,765	35,572	7,193
Holland	16,760	10,363	6,397
Borneo	5,667	..	5,667
Singapore	26,954	23,113	3,841
Philippine Islands	10,828	8,103	2,725
British Columbia	22,209	19,858	2,351
Burmah	3,541	2,234	1,307
Hongkong	19,568	18,670	898
Tasmania	34,811	33,927	884
Spain	1,822	988	834
Portugal	1,069	600	469
Newfoundland	423	..	423
Denmark	2,133	1,800	333
Norway	603	300	303
Bombay	705	447	258
Switzerland	2,432	2,198	234
Austria	1,798	1,655	143
Sandwich Islands	224	90	134
Turkey	263	136	127
Borneo (British)	110	..	110
Malta	65	..	65
Norfolk Island	78	43	35
Transvaal Colony	51	19	32
New Hebrides	25	..	25
Lord Howe Island	19	..	19
Egypt	715	700	15
Gibralter	15	..	15
Solomon Islands	9	..	9
Orange River Colony	7	..	7
Tripoli	7	..	7
Argentine Republic	5	..	5
Rhodesia	2	..	2

Country, Colony, State, &c.	1903. £	1902. £	Decrease. £
Java	2,841	55,005	52,164
Bengal	251,719	284,742	33,023
Malden Island	3,965	15,665	11,700
Ocean Island	3,625	13,500	9,875
South Australia	39,627	47,135	7,508

Country, Colony, State, &c.	1903. £	1902. £	Decrease. £
China	5,005	12,500	7,495
Surprise Island	1,907	8,206	6,299
Queensland	2,222	6,991	4,769
Friendly Islands	6,978	9,756	2,778
Navigators' Islands	837	3,597	2,760
Sweden	17,156	19,243	2,087
West Indies	1,734	3,019	1,285
Madras	146	872	726
Cape Colony	195	843	648
West Indies (British)	..	190	190
Society Islands	5,803	5,983	180
Natal	44	135	91
New Guinea	..	82	82
Canary Islands	3	41	38
New Caledonia	4	23	19
Russia	..	10	10

The following table gives the value of the imports for each port in New Zealand for the last two years, arranged in order of magnitude for 1903 :—

	1903. £	1902. £
Wellington	3,966,891	3,124,771
Auckland	3,167,185	3,087,460
Dunedin	2,049,194	1,956,235
Lyttelton	2,025,427	1,745,273
Invercargill and Bluff ..	292,683	341,798
Napier	234,994	211,297
Timaru	169,117	148,033
Wanganui	166,869	134,158
Nelson	146,279	122,555
New Plymouth	99,762	81,488
Greymouth	88,912	69,514
Poverty Bay	67,304	39,902
Oamaru	51,801	51,428
Westport	43,178	35,218
Wairau	21,825	15,861
Patea	20,495	17,227
Hokitika	14,337	13,105
Tauranga	4,776	2,441
Kaipara	4,520	4,568
Picton	1,890	479

Imports, by Provincial Districts.

The values of imports in each provincial district during 1893 and 1903 were as under :—

	1893. £	1903. £
Auckland	1,512,654	3,243,785
Taranaki	53,524	120,257
Hawke's Bay	200,437	234,994
Wellington	1,770,480	4,133,760
Marlborough	13,573	23,715
Nelson	139,150	189,457
Westland	60,972	103,249
Canterbury	1,379,733	2,194,544
Otago	1,756,429	2,393,678

The value of imports by parcel-post (£24,563 in 1893 and £151,236 in 1903) must be added to the above figures in order to make up the totals (including specie) of £6,911,515 and £12,788,675 for the respective years.

Imports, North and Middle Islands.

Separating the value of the imports for the North Island from that of the Middle Island, it is found that while in 1893 the former received imported goods to the value of £3,537,095, against £3,349,857 for the Middle Island, in the year 1903 the North Island imports exceeded those of the other to a far greater extent, the values being respectively £7,732,796 and £4,904,643, or an excess for the North Island of £2,828,153, or 57·66 per cent.

Details of all Articles of Import.

Details of all imports for 1903, giving quantities and values of articles introduced into the colony, with the amounts entered for Home consumption, and the amount of duty received, are next shown:—

General Imports into the Colony of New Zealand during the Year 1903.

(For rates of duty, see Tariff, pp. 84 to 102.)

Articles.	Total Quantities Imported.	Value of Total Imports.	Entered for Home Consumption on Importation and ex Warehouse.	Amount of Duty received, including Preferential.
		£		£ s. d.
Acid—				
Acetic	415,825 lb.	3,559	464,550 lb.	2,903 8 8
Carbolic	24,151 „	544	..	..
Salicylic	3,585 „	225	..	..
Sulphuric	199,824 „	1,657	..	..
Tartaric	92,604 „	5,004	92,590 lb.	385 15 10
Unenumerated ..	47,526 „	1,268	..	..
Alkali—				
Potash and caustic potash	2,018 cwt.	2,813	..	..
Soda ash	14,628 „	4,966	..	..
Soda, carbonate and bicarbonate	11,803 „	3,744	11,927 cwt.	596 6 10
Soda, caustic	11,922 „	8,627	..	..
Soda crystals	157 „	43	157 cwt.	15 13 6
Soda silicate	4,407 „	1,497	..	..
Unenumerated ..	7,689 „	4,474	..	..
Alum	1,599 „	674	..	..
Animals, Living—				
Birds	1,398 No.	582	..	..
Cats	4 „	15	..	..
Cattle, horned	31 „	1,645	31 No.	15 10 0
Deer	12 „	68	..	..
Dogs	131 „	650	..	..
Hares	102 „	23	..	..
Horses	782 „	33,775	767 No.	767 0 0
Leeches	..	6	..	..
Opossums	2 No.	1	..	..
Pigs	6 „	94	..	..
Poultry	402 „	796	..	..

GENERAL IMPORTS INTO THE COLONY OF NEW ZEALAND DURING 1903—*continued.*

Articles.	Total Quantities Imported.	Value of Total Imports.	Entered for Home Consumption on Importation and ex Warehouse.	Amount of Duty received, including Preferential.
		£		£ s. d.
Animals, Living—*continued.*				
Sheep	885 No.	5,231	..	..
Tortoises	9 „	2	..	..
Turtles	1 „	3	..	..
Apparel and slops n.o.e.	..	582,187	£579,511	144,877 13 6
Apparel made to the order of residents in the colony	..	810	£810	323 19 6
Arms, ammunition, and explosives—				
Accoutrements	..	2,292	..	..
Caps, percussion	8,855,000 No.	1,086	..	..
Cartridges (shot), 10- to 24-bore	5,341,190 „	17,299	5,321,833 No.	3,991 7 6
Cartridges n.o.e.	11,995,910 „	14,412	£6,542	1,308 8 7
Cartridge-cases	200,840 „	313	199,820 No.	74 18 8
Detonators for dynamite	..	2,470	..	..
Dynamite	188,000 lb.	8,814	..	..
Firearms	11,529 No.	19,227	£14,659	2,931 16 1
Fuse	164,143 coils	3,892	..	..
Lithofracteur and cordite	575,750 lb.	26,280	..	..
Ordnance stores	..	18,496	..	..
Powder, blasting	460,584 lb.	12,020	..	..
„ sporting	17,675 „	2,022	16,200 lb.	405 0 0
Shot	580 cwt.	631	211 cwt.	105 10 10
Swords	421 No.	876	..	..
Other explosives	77,540 lb.	6,906	..	..
Unenumerated	..	1,110	..	..
Asphalt	13,656 cwt.	3,152	..	..
Bacon and hams	1,714 lb.	62	752 lb.	6 5 4
Bags and sacks—				
Cornsacks	455,951 doz.	101,922	..	..
Unenumerated	43,019 „	7,118	£1,145	229 0 0
Bagging and sacking	..	1,145	£4	0 12 0
Basketware and wickerware	..	4,399	£4,168	833 10 11
Beer	203,766 galls.	38,620	204,126 galls.	20,412 11 10
Belting, leather	34,955 lb.	4,299	32,669 lb.	544 9 8
„ other than leather	..	23,020	..	..
Beverages, non-alcoholic—				
Aerated and mineral waters	9,992 doz.	2,210	£2,128	425 14 0
Coffee essence	..	8,449	£9,166	1,833 2 2
Limejuice, sweetened	3,964 galls.	867	£946	236 11 7
„ unsweetened	16,519 „	2,569	..	..
Unenumerated	..	743	£705	176 4 7
Bicycles and tricycles	10,870 No.	71,082	£66,721	13,345 18 9
Materials for	..	90,487	£93,012	8,731 10 2
Biscuits—				
Fancy, and other kinds	71,851 lb.	3,416	71,358 lb.	594 13 0
Ships', plain	76 cwt.	56	74 cwt.	11 1 0
Blacking	..	9,244	£9,191	1,838 2 4
Blacklead	..	3,759	£3,790	758 1 6
Blue	197,636 lb.	4,927	225,084 lb.	1,875 14 0
Boats	34 No.	852	..	..

GENERAL IMPORTS INTO THE COLONY OF NEW ZEALAND DURING 1903—*continued.*

Articles.	Total Quantities Imported.	Value of Total Imports.	Entered for Home Consumption on Importation and ex Warehouse.	Amount of Duty received, including Preferential.
		£		£ s. d.
Bones	6 tons	35	..	..
Books, &c., printed ..	..	171,672	..	..
Boots and shoes	115,014 doz. pr.	235,280	£234,437	52,751 2 10
Gum-boots	1,272 „	10,359	..	..
Borax	2,258 cwt.	2,421	..	..
Brass—				
Pig, bar, tube, or sheet ..	1,087 „	4,555	..	..
Tubing or stamped work in the rough ..	292	1,302	..	..
Manufactures	..	11,587	£11,547	2,309 8 7
Bricks—				
Building	189,760 No.	573	..	..
Fire	270,906 „	894	£894	178 16 0
Other kinds	34,188 „	182	..	..
Brushware and brooms—				
Brooms	2,751 doz.	1,579	£1,661	415 5 0
Brushes (clothes, hair, hat, and toilet) ..	..	7,939	£8,020	1,603 19 2
Unenumerated ..	..	6,834	£6,704	1,676 2 3
Materials for	..	7,263	..	..
Buckets and tubs—				
Iron	569 doz.	370	£355	88 14 10
Wood	204 „	80	£80	16 0 0
Building materials, unenumerated	..	4,105	..	..
Butter	50 cwt.	257	..	..
Candles	3,042,053 lb.	56,488	3,066,042 lb.	12,775 3 6
Canes and rattans ..	..	2,209	..	..
Canvas	..	44,939	..	..
Caramel, brewers' ..	12,593 lb.	151	12,653 lb.	158 3 3
„ cereal	144 „	4	48 „	0 2 0
Cards, playing	143,270 packs	2,610	67,150 packs	1,678 15 0
Carpeting and druggeting ..	..	44,801	£43,938	8,787 11 11
Carriages, &c.—				
Automobiles, motor cars, and motor cycles ..	153 No.	16,598	£16,292	3,258 10 0
Automobilles, &c., materials for	..	1,159	£1,159	231 16 0
Carriages	320 „	9,253	£9,380	1,879 13 5
Carts, drays, and wagons	384 „	4,051	£4,051	810 4 0
Steam-motor lorries ..	4 „	2,113	£2,113	422 12 0
Perambulators and go-carts	95 „	145	£155	31 0 0
Materials for	..	10,842	£10,814	2,162 16 6
Materials for axles, axle-arms, and boxes ..	..	18,752	..	..
Carriage and cart shafts, spokes, and felloes in the rough	..	6,795	..	..
Carriage and cart makers' materials	..	16,920	..	..

GENERAL IMPORTS INTO THE COLONY OF NEW ZEALAND DURING 1903—*continued.*

Articles.	Total Quantities Imported.	Value of Total Imports.	Entered for Home Consumption on Importation and ex Warehouse.	Amount of Duty received, including Preferential.
		£		£ s. d.
Casks, empty	659 No.	790	£785	157 0 0
Cement	168,765 barrels	75,148	160,214 barrels	16,021 8 0
Chains and chain cables	7,310 cwt.	8,418	..	..
Charcoal	4,535 „	1,927	..	..
Cheese	45 „	270	£239	47 14 2
Chicory	22,566 lb.	243	166 lb.	2 1 6
China, porcelain, and parian-ware	..	28,445	£28,389	5,684 10 1
Clocks	47,988 No.	14,888	£15,018	3,007 16 4
Coal	163,923 tons	158,143	..	..
Cocoa and chocolate	483,256 lb.	49,380	473,960 lb.	5,924 10 0
Cocoa beans	191,045 „	6,381	..	..
Coffee—				
Raw	240,172 lb.	8,548	..	..
Roasted	2,092 „	91	1,939 lb.	24 4 9
Coke	1,668 tons	4,237	..	..
Combs	..	2,196	£2,196	439 2 10
Confectionery—				
Chocolate in plain trade packages	213,539 lb.	10,583	209,296 lb.	2,616 4 0
Chocolate, fancy packages	..	11,110	£11,144	2,228 17 9
Unenumerated	551,463 lb.	16,999	532,997 lb.	4,441 12 11
Copper—				
Nails	271 cwt.	1,166	..	..
Pig, bar, sheet, and tube	6,876 „	26,514	..	..
Rod and bolt	285 „	1,252	..	..
Sheathing	303 „	918	..	..
Manufactures	..	333	£320	64 1 4
Copra	84 tons	999	..	..
Cordage	4,652 cwt.	13,718	£13,439	2,687 17 8
Hawsers of 12 in. and over	168 „	280	..	..
Iron and steel	11,681 „	25,939	..	..
Cork, cut	..	11,256	£10,729	2,145 15 6
„ in the rough	117 cwt.	192	..	..
Cotton piece-goods—				
Butter and cheese cloth	..	2,705	..	..
Calico, white and grey	..	189,378	..	..
Corduroy, moleskin, and beaver-skin	..	2,911	..	..
Leather-cloth	..	6,678	..	..
Shirtings, coloured cotton	..	37,146	..	..
„ flannelette	..	5,324	..	..
„ union, of 6d. per yard and under	..	2,023	..	..
Tubular woven cotton cloth	..	12,895	..	..
Waterproof material	..	9,025	..	..
Unenumerated	..	288,479	£281,790	42,683 15 9
Cotton—				
Raw	4,139 lb.	52	..	..
Waste	4,132 cwt.	5,584	..	..
Wick	95,607 lb.	4,240	..	..
Cutlery	..	27,160	£26,867	5,373 9 8

GENERAL IMPORTS INTO THE COLONY OF NEW ZEALAND DURING 1903—*continued.*

Articles.	Total Quantities Imported.	Value of Total Imports.	Entered for Home Consumption on Importation and ex Warehouse.	Amount of Duty received, including Preferential.
		£		£ s. d.
Doors, plain	476 No.	254	476 No.	47 12 0
Drapery	..	293,496	£293,357	58,671 8 1
Lace and laces, n.o.e.	..	80,270	£79,753	19,938 3 1
Ribbons and crape	..	32,571	£32,578	8,144 10 4
Tailors' trimmings	..	105,380	..	..
Drugs, chemicals, and druggists' wares—				
Baking-powder, yeast preparations, &c.	..	477	£453	90 10 11
Chemicals n.o.e.	..	5,255	£4,470	670 10 9
Cream of tartar	878,517 lb.	33,808	890,317 lb.	3,709 13 1
Drugs, druggists' sundries, and apothecaries' wares	..	90,703	£90,147	13,522 1 11
Glycerine, refined	..	2,451	£2,378	475 13 5
Tinctures and medicinal spirits	21,714 lb.	1,471	22,639 lb.	1,131 18 7
Washing-powder	..	695	£578	115 13 11
Anhydrous ammonia	..	6,969	..	..
Arsenic	1,065 cwt.	917	..	..
Disinfectants	..	5,918	..	..
Food preservative	..	4,588	..	..
Gums	..	2,679	..	..
Insecticides and tree-washes	..	2,307	..	..
Maltine	..	845	..	
Medicinal barks, leaves, &c.	..	1,430	..	..
Phosphorus	..	808	..	..
Potassium cyanide	9,961 cwt.	47,951	..	..
Sheep-dip	..	28,664	..	..
Sheep and horse drenches and sheep licks	..	159	..	..
Unenumerated	..	23,769	..	..
Dyes	..	17,249	..	..
Earthenware	..	61,308	£61,378	12,277 4 9
Eggs for setting	21 doz.	18	..	..
Engine-packing	3,744 cwt.	10,158	..	..
Essences, flavouring—				
Spirituous	1,853 gals.	5,399	2,014 gals.	1,611 8 9
Unenumerated	..	150	£127	19 2 5
Essential oils—				
Eucalyptus	9,108 lb.	2,465	£2,414	482 15 9
Other kinds	37,053 "	5,645	..	..
Fancy goods	..	177,227	£175,318	35,114 12 9
Felt sheathing	..	6,862	..	..
Fire-engines	32 No.	1,416	..	..
Fire-hose and other appliances	..	3,890	..	..
Fireworks	..	1,149	£951	190 4 0
Fish—				
Anchovies, salted	27 cwt.	61	..	..
Dried, pickled, and salted	2,921 "	5,237	2,921 cwt.	1,460 9 2
Potted and preserved	2,078,106 lb.	48,658	2,090,810 lb.	17,427 6 8

GENERAL IMPORTS INTO THE COLONY OF NEW ZEALAND DURING 1903—*continued.*

Articles.	Total Quantities Imported.	Value of Total Imports.	Entered for Home Consumption on Importation and ex Warehouse.	Amount of Duty received, including Preferential.
		£		£ s. d.
Fishing-tackle—				
Artificial flies	..	304	£299	74 15 0
Fish-hooks	..	553	..	..
Unenumerated	..	4,302	£4,259	851 16 10
Flock	332 cwt.	248	£248	24 16 0
Floorcloth and oilcloth	..	86,242	£85,981	17,196 3 7
Flour	34,201 centals	16,704	32,682 centals	1,634 2 4
Foods, animal—				
Chaff	57 tons	176	57 tons	56 16 5
Prepared calf-meal	2 „	32	2 „	3 0 3
Unenumerated	..	4,443	£4,375	874 19 4
Foods, farinaceous—				
Arrowroot	81,812 lb.	1,240	..	..
Macaroni and vermicelli	135,610 lb.	1,919	..	..
Maizena and corn-flour	1,032,251 „	13,195	1,079,448 lb.	1,124 8 6
Sago and tapioca	20,827 cwt.	10,112	..	..
Unenumerated	..	3,094	..	..
Fruits, bottled and preserved	85,540 doz.	19,974	£19,355	4,838 13 11
Fruits, dried—				
Currants	3,310,142 lb.	26,141	3,127,276 lb.	13,030 6 4
Raisins	3,068,007 „	44,696	2,896,455 „	12,068 11 3
Unenumerated	1,776,905 „	23,175	1,668,321 „	13,902 13 5
Fruits, fresh—				
Apples, pears, plums, &c.	778,850 „	10,622	778,850 „	3,245 4 2
Apples and pears	599,610 „	6,680	599,610 „	1,249 3 9
Currants, raspberries, &c.	1,590 „	10	1,590 „	3 6 3
Lemons	684,292 „	6,915	690,792 „	1,439 3 0
Other kinds	16,397,692 „	91,860	..	..
Lemon and orange peel, in brine	511,310 „	3,252	..	.
Preserved in sulphurous acid	2,077 „	21	2,077 lb.	8 13 1
Pulp and partially preserved fruit	4,812 „	36	4,632 „	98 19 0
Fungus	..	1	..	..
Furniture, cabinetware, and upholstery	..	43,820	£44,145	11,056 11 3
Kapok	7,919 cwt.	22,830	..	..
Unenumerated	..	5,807	..	..
Furniture, knife, and plate powder and polish	..	5,875	£5,866	1,173 5 1
Furs	..	5,756	£5,736	1,433 18 3
Gelatine and isinglass	130,327 lb.	7,597	£7,146	1,429 3 3
Glass—				
Bottles, empty	..	43,382	..	..
Mirrors and looking-glasses	..	6,857	£6,827	1,706 17 1
Plate, bevelled, &c.	..	5,933	£6,049	1,512 5 10
„ other kinds	392,488 sup. ft.	11,860	£11,789	2,357 16 10
Window	3,478,122 „	27,882	3,441,492 sup. ft.	3,442 9 10
Glassware	..	49,145	£40,238	8,052 7 7
Glue and size	124,144 lb.	2,468	121,287 lb.	758 0 10
Gold-leaf	..	652	..	..

GENERAL IMPORTS INTO THE COLONY OF NEW ZEALAND DURING 1903—*continued.*

Articles.	Total Quantities Imported.	Value of Total Imports.	Entered for Home Consumption on Importation and ex Warehouse.	Amount of Duty received, including Preferential.
		£		£ s. d.
Grain and pulse—				
Barley	727 centals	241	7 centals	0 14 0
Beans and peas ..	1,176 „	696	1,176 „	44 2 4
Maize	389 „	90	389 „	14 11 11
Oats	905 „	288	19 „	0 13 11
Wheat	24 „	14	24 „	0 17 10
Unenumerated ..	16,334 „	6,395	15,944 „	597 18 0
Ground, unenumerated..	6,396 „	5,764	7,096 „	354 16 3
Grease	5,096 cwt.	3,707	£3,636	727 5 6
Grindery—				
Heel and toe plates ..	..	2,697	£2,617	588 16 3
Unenumerated ..	..	20,779	..	..
Haberdashery	..	23,125	£23,118	4,623 11 9
Buttons, &c.	..	35,074	..	..
Sewing-cottons, silks, and threads	..	59,023	..	..
Unenumerated ..	..	827	..	..
Hair	500 cwt.	1,755	..	..
Hardware, hollow-ware, and ironmongery ..	..	300,959	£299,173	59,837 16 11
Coffin furniture ..	..	2,018	£2,155	430 18 1
Hardware	..	2,927	..	..
Hats and caps	77,469 doz.	77,853	£77,379	19,344 16 9
Hatters' materials ..	..	25,461	..	..
Hemp	241 tons	9,100	..	..
Hides	3,578 No.	4,521	..	..
Honey	115 lb.	2	115 lb.	0 19 2
Hops	79,277 „	5,758	80,925 „	2,027 8 9
Hosiery	..	125,618	£125,478	25,095 13 9
Indiarubber and gutta-percha goods	..	12,680	£127	25 8 0
Ink—				
Printing	167,110 lb.	7,287	..	..
Writing	..	2,231	£2,027	405 9 4
Instruments, musical—				
Harmoniums and organs	744 No.	7,277	£7,253	1,450 12 0
Pianos	3,679 „	85,656	£86,956	17,406 2 0
Unenumerated ..	..	20,597	£20,671	4,134 5 6
For Volunteer bands ..	..	319	..	..
Materials for	..	2,336	£162	32 8 0
Instruments, other kinds—				
Optical	..	2,398	..	..
Scientific	..	3,197	..	..
Surgical and dental ..	..	32,780	£32,767	2 12 0
Surveying	..	1,467	..	..
Unenumerated ..	..	799	..	..
Iron and steel—				
Angle	389 tons	2,810	..	..
Bar, bolt, and rod ..	13,540 „	119,672	..	..
Bolts and nuts ..	19,394 cwt.	20,994	..	..
Castings for ships ..	27 tons	1,009	..	..

GENERAL IMPORTS INTO THE COLONY OF NEW ZEALAND DURING 1903—*continued.*

Articles.	Total Quantities Imported.	Value of Total Imports.	Entered for Home Consumption on Importation and ex Warehouse.	Amount of Duty received, including Preferential.
Iron and steel—*continued.*		£		£ s. d.
Galvanised manufactures	..	1,089	£1,077	269 4 8
Hoop	1,914 tons	19,288	..	..
Hoop, galvanised ..	4,149 cwt.	2,733	4,141 cwt.	310 10 11
Pig	8,026 tons	34,735	..	..
Pipes and fittings ..	12,288 „	117,434	£117,484	5,874 4 3
Rails	15,810 „	101,352	..	..
Railway bolts and fastenings	2,400 „	30,240	£487	97 6 0
Sheet and plate ..	6,674 „	59,972	£59,968	0 16 0
Sheet, galvanised, corrugated	254,004 cwt.	200,688	251,270 cwt.	25,126 19 7
Sheet, galvanised, plain	61,305 „	51,252	60,790 „	4,559 5 7
Staples and standards ..	453 tons	4,952	£4,958	991 12 1
Tanks	3,688 No.	11,160	3,651 No.	1,611 10 0
Wire, fencing, barbed ..	2,894 tons	35,947	..	..
Wire, fencing, plain ..	6,332 „	61,197	..	..
Wire, telegraphic and telephonic	24 „	399	..	..
Telegraphic cable ..	140 „	6,312	..	..
Wire-netting	..	31,522	..	..
Wire, unenumerated ..	899 tons	12,049	..	..
Unenumerated ..	39 „	544	..	..
Jams, jellies, and preserves	506,972 lb.	8,428	494,662 lb.	4,122 3 7
Jellies, concentrated ..	85,691 „	2,952	78,210 „	1,303 10 1
Jewellery	..	25,753	£20,458	4,091 13 0
Lamps, lanterns, and lamp-wick	..	26,463	£25,995	5,211 11 1
Lard	80 cwt.	133	£133	26 12 0
Lead—				
Pigs and bars	845 tons	10,754	..	..
Pipe (including composition)	955 cwt.	959	827 cwt.	144 15 4
Sheet	20,867 „	16,143	19,886 „	1,491 8 6
Manufactures ..	..	404	£404	80 16 0
Leather	563,698 lb.	83,896	511,558 lb.	3,695 9 4
Chamois	..	506	£445	89 2 0
Leather manufactures—				
Boot and shoe vamps, uppers, and laces ..	..	9,231	£9,139	2,056 13 8
Unenumerated ..	..	1,961	£2,078	438 2 6
Lighthouse, materials for ..	..	641	..	..
Linen piece-goods—				
Forfar, dowlas, and flax sheetings n.o.e. ..	..	13,783	£2,150	429 18 11
Forfar, dowlas, &c., cut up under supervision ..	..	..	£11,122	..
Hessians and scrim ..	..	57,637	..	..
Linens n.o.e.	..	23,374	£22,762	4,552 9 9
Linseed	..	1	1 cwt.	0 1 0
Liquorice	..	3,116	£3,164	632 17 0

GENERAL IMPORTS INTO THE COLONY OF NEW ZEALAND DURING 1903—*continued.*

Articles.	Total Quantities Imported.	Value of Total Imports.	Entered for Home Consumption on Importation and ex Warehouse.	Amount of Duty received, including Preferential.
		£		£ s. d.
Machinery and machines—				
Agricultural (including agricultural implements)	..	108,310	..	..
Agricultural, ploughs and harrows	..	9,001	..	..
Dairying	..	40,776	..	..
„ engines for ..	..	979	£1,748	87 8 0
„ boilers for ..	..	1,353	£1,940	97 0 6
Dredging	..	4,387	..	..
Electric	..	111,040	£79,922	7,992 3 4
Engines, steam ..	108 No.	12,979	£11,318	2,263 12 0
„ gas	942 „	57,506	£57,121	77 0 0
„ boilers for ..	127 „	9,114	£8,378	1,675 12 0
Flour-milling	..	5,779	£5,783	289 3 6
Gas-making	..	25,970	£25,603	2,560 6 2
Mining	..	45,702	..	..
„ boilers for ..	..	3,064	£3,172	158 12 0
„ engines for ..	..	899	£1,977	98 17 0
Paper-milling	..	3,111	£2,981	149 1 0
Portable and traction engines	122 No.	52,674	..	..
Printing	..	23,311	£22,560	1,128 0 6
Refrigerating	..	11,122	£9,005	450 5 0
Sewing and knitting ..	13,775 No.	51,095	..	..
Wood-working	..	25,286	..	..
Woollen-milling ..	..	13,398	£11,966	598 6 6
Unenumerated ..	..	70,837	£61,280	11,274 9 5
Materials for and parts of	..	14,478	£1,485	287 5 0
Malt	2,997 bush.	1,006	2,789 bush.	278 17 6
Rice-malt	11,036 lb.	79	11,036 lb.	45 19 8
Manures—				
Bone-dust	8,112 tons	41,514	..	..
Guano	3,800 „	12,109	..	..
Unenumerated ..	18,613 „	67,088	..	..
Marble—				
Dressed and polished, and manufactures ..	..	8,767	£8,812	2,202 19 10
Hewn, or rough-sawn ..	275 tons	2,046	..	..
Matches and vestas—				
Wax .. (boxes)	60,345 gross	8,928	58,694 gross	3,937 18 0
Wooden .. „	29,139 „	2,548	25,468 „	1,278 10 11
Mats and matting ..	..	10,726	£10,546	2,109 18 3
Meats, potted and preserved	120,478 lb.	4,244	£3,982	796 8 10
Medicines, patent and proprietary	..	49,182	£47,099	7,064 15 7
Metal, manufactures—				
Japanned and lacquered metalware	..	1,244	£1,242	310 11 0
Unenumerated ..	..	19,543	£18,995	3,799 1 6
Weighbridges and weighing machines ..	..	4,475	£4,426	885 4 4
Anchors	754 No.	594	..	..
Rivets and washers ..	8,091 cwt.	8,039	..	..

GENERAL IMPORTS INTO THE COLONY OF NEW ZEALAND DURING 1903—*continued*.

Articles.	Total Quantities Imported.	Value of Total Imports.	Entered for Home Consumption on Importation and ex Warehouse.	Amount of Duty received, including Preferential.
Metal, manufactures—*ctd.*		£		£ s. d.
Tacks	1,896 cwt.	2,810	..	..
Type-writers	1,123 No.	15,857	..	..
Unenumerated	..	54,207	..	..
Metal sheathing, other than copper	626 cwt.	1,647	..	..
Milk, preserved	1,009,602 lb.	19,201	£18,230	4,557 8 11
Millinery—				
Feathers, ornamental	..	3,383	£3,370	842 9 0
Other kinds	..	57,120	£56,931	14,232 17 4
Mustard	219,622 lb.	12,249	223,572 lb.	1,863 1 11
Nails—				
Iron	70,788 cwt.	39,241	70,608 cwt.	7,060 19 3
Unenumerated	61 „	199	48 „	7 3 2
Naphtha (wood)	5,360 gal.	1,155	5,281 gal.	132 0 6
Nuts—				
Almonds, in shell	20,250 lb.	414	16,410 lb.	136 15 1
Almonds, shelled	42,025 „	3,201	42,757 „	534 9 2
Almonds, Barbary, &c.	215,580 „	7,976	..	..
Cocoanuts	51,136 No.	220	..	..
Unenumerated	58,957 lb.	1,022	59,547 lb.	496 4 6
Oakum	238 cwt.	291	..	..
Oars	1,919 No.	342	..	..
Oils—				
Castor, bulk	74,667 galls.	7,621	66,197 galls.	1,654 18 5
Castor, bottled	1,063 doz. pt.	443	£498	74 13 4
Cod liver	20,284 galls.	3,935	..	..
Colza	11,234 „	1,393	11,431 galls.	285 15 9
Fish, penguin, and seal	42,875 „	3,800	..	..
Linseed	334,495 „	42,677	332,463 galls.	8,311 11 6
Mineral, kerosene	3,440,326 „	122,933	..	..
„ other kinds	189,628 „	13,910	179,042 galls.	4,476 1 2
Neatsfoot	250 „	25	250 „	6 5 0
Olive, bulk	8,707 „	1,558	8,560 „	213 19 10
Olive, bottled	2,377 doz. pts	1,250	£1,216	182 7 3
Unenumerated, bulk	302,752 galls.	27,700	274,939 galls.	6,873 9 9
Unenumerated, bottled	8,418 doz. pts	3,681	£3,735	560 4 5
Unenumerated	378,291 galls.	17,933	..	..
Oilmen's stores	..	9,329	£9,113	1,822 10 7
Onions	27,324 cwt.	6,586	27,017 cwt.	1,350 17 5
Opium	96 lb.	101	96 lb.	192 9 4
Paints and colours—				
Ground in oil	38,907 cwt.	43,475	37,638 cwt.	4,704 15 3
Mixed, ready for use	5,910 „	14,839	5,372 „	1,342 19 9
Unenumerated	14,496 „	15,208	..	..
Paper—				
Bags, coarse	81 „	118	194 cwt.	72 17 2
Bags, other kinds	3,734 „	5,674	£5,619	1,404 15 10
Butter-paper	5,689 „	10,198	..	..
Paperhangings	..	35,853	£35,841	5,376 3 7
Printing	138,147 cwt.	120,909	..	..

GENERAL IMPORTS INTO THE COLONY OF NEW ZEALAND DURING 1903—*continued.*

Articles.	Total Quantities Imported.	Value of Total Imports.	Entered for Home Consumption on Importation and ex Warehouse.	Amount of Duty received, including Preferential.
		£		£ s d.
Paper—*continued.*				
Wrapping	9,026 cwt.	9,735	8,541 cwt.	2,135 2 8
Writing	14,646 „	27,048	..	..
Unenumerated ..	1,184 „	3,006	..	..
Pearl barley	30 „	16	30 cwt.	1 10 3
Peas, split	1,068 „	603	1,064 „	106 9 0
Peel, candied and dried ..	15,448 lb.	313	15,393 lb.	192 8 2
Perfumery—				
Perfumed spirits ..	1,656 galls.	6,972	1,691 galls.	2,536 17 6
Toilet preparations ..	..	10,549	£10,314	2,578 8 10
Unenumerated ..	..	1,411	£1,491	372 13 2
Photographic goods ..	..	7,571	£7,229	1,445 17 6
Copper, glass, and zinc plates for photo-lithographic work ..	..	678	..	..
Photographic cameras and lenses	..	7,075	..	..
Sensitised surfaces for photographic purposes	..	19,234	..	..
Pickles	6,191 galls.	1,856	6,075 galls.	911 6 8
Pictures, paintings, drawings, engravings, and photographs ..	..	9,609	£8,574	1,714 17 9
Family portraits ..	..	40	..	..
Paintings, &c., for museums, &c.	..	7	..	..
Picture frames and mounts	..	2,231	£2,225	445 0 0
Pitch	2,053 cwt.	811	..	..
Plants, trees, and shrubs ..	..	4,932	..	..
Plaster of Paris	6,467 cwt.	1,285	..	..
Plate and plated ware ..	..	56,395	£58,394	11,679 7 3
Portmanteaux and travelling-bags	..	6,720	£6,644	1,661 0 3
Leather and leather-cloth bags	..	109	£109	21 16 0
Potatoes	140 tons	409	£409	81 15 9
Seed potatoes	22 „	81	..	..
Printing materials—				
Stereotypes and matrices	..	340	£340	85 1 0
Type and materials, n.o.e.	..	12,235	..	..
Provisions n.o.e.	..	12,469	£12,263	2,454 12 1
Eggs*	18,762 doz.	898	£898	179 14 0
Pumps	..	7,464	£5,580	1,118 1 1
Putty	5,467 cwt.	2,729	5,453 cwt.	545 6 4
Quicksilver	5,704 lb.	704	..	..
Railway plant—				
Locomotives (small engines for private sidings)	3 No.	1,836	..	..
Unenumerated ..	..	120,328	£9,582	1,916 7 4
Resin	9,837 cwt.	3,589	..	..
Rice	70,132 „	48,259	..	..
Rice-flour	117 „	104	117 cwt.	35 0 9

* For six months only; previously included under the general heading of "Provisions, n.o.e."

GENERAL IMPORTS INTO THE COLONY OF NEW ZEALAND DURING 1903—*continued*.

Articles.	Total Quantities Imported.	Value of Total Imports.	Entered for Home Consumption on Importation and ex Warehouse.	Amount of Duty received, including Preferential.
		£		£ s. d.
Rugs	..	16,760	£16,634	3,326 16 5
Saccharine	5,384 oz.	158	8,601 oz.	645 1 6
Saddlery and harness (including whips)	..	31,921	£31,791	6,358 5 0
Harness oil, composition, and leather-dressing	..	2,118	£2,164	432 15 5
Saddlers' ironmongery and materials	..	24,402	..	..
Collar-check	..	6,185	..	..
Salt	14,211 tons	29,730	..	..
Rock salt	588 „	1,096	..	..
Saltpetre	113 „	2,061	..	..
Sauces	14,165 gals.	10,190	14,686 gals.	2,937 4 3
Sausage-skins	181,710 lb.	10,331	187,328 lb.	2,341 12 0
Seeds—				
Grass and clover	21,790 cwt.	66,002	..	..
Unenumerated	..	28,769	..	..
Shale	46 tons	101	..	..
Shells	34 cwt.	172	..	..
Ship-chandlery n.o.e.	..	4,151	..	..
Silks, &c.	..	128,223	£126,008	31,502 1 0
Silk for flour-dressing	..	110	..	..
Silver	706 oz.	86	..	..
Skins and pelts—				
Fur-skins	60 No.	2	..	..
Kangaroo and wallabi	11,401 „	340	..	..
Unenumerated	14,677 „	876	..	..
Slates, roofing	154,128 „	1,561	..	..
Soap—				
Common	30 cwt.	52	30 cwt.	7 7 6
Soap-powder, extract of soap, &c.	..	6,201	£6,223	1,244 12 6
Unenumerated	..	33,308	£33,164	8,290 19 8
Specie—				
Gold	..	613,270	..	..
Silver	..	95,096	..	..
Copper	..	4,350	..	..
Specimens illustrative of natural science	..	54	..	..
Spices—				
Ground	17,243 lb.	765	17,782 lb.	296 7 3
Unground	542,557 „	15,052	520,268 „	4,335 11 4
Spirits—				
Bitters, cordials, and liqueurs	3,699 galls.	3,228	3,040 galls.	2,432 2 6
Brandy	82,371 „	36,861	70,856 „	56,684 19 8
Geneva and gin, unsweetened	86,871 „	20,515	72,125 „	57,699 17 2
Methylated	282 „	38	262 „	13 1 8
Rum	12,581 „	2,476	16,580 „	13,263 12 1
Sweetened, &c.	7,604 „	2,120	6,933 „	5,546 10 5
Whisky	461,560 „	166,438	442,615 „	354,091 19 6
Unenumerated	3,120 „	3,021	3,301 „	2,640 13 7

GENERAL IMPORTS INTO THE COLONY OF NEW ZEALAND DURING 1903—*continued.*

Articles.	Total Quantities Imported.	Value of Total Imports.	Entered for Home Consumption on Importation and ex Warehouse.	Amount of Duty received, including Preferential.
		£		£ s. d.
Spirits of wine	70,676 galls.	4,594	2,185 „	1,748 4 0
Methylated, in bond	..	..	50,407 „	1,260 3 7
Sponges	.	383	£176	26 7 3
Starch	937,643 lb.	9,964	920,255 lb.	7,668 15 10
Stationery—				
Manufactured	..	54,063	£51,387	12,846 13 4
Unenumerated	..	51,313	£44,898	8,979 12 8
Apparatus and appliances for teaching purposes	..	6,090	..	..
Bookbinders' materials	..	8,309	..	..
Cardboard-boxes, materials for	..	12,220	..	..
Unenumerated	..	4,973	..	..
Stearine	112 lb.	3	112 lb.	0 14 0
For match-making	325,184 „	7,336	325,317 „	1,016 12 4
Stone—				
Building	1,046 tons	2,434	..	..
Flagging	10 „	28	..	..
Granite and other stone, dressed, or polished, &c.	..	3,760	£3,760	940 0 0
Grind-, mill-, oil-, and whet-stones	..	3,093	..	..
Sugar—				
Raw	822,390 cwt.	411,662	1,124 lb.	2 6 10
Refined	32,585 „	24,731	88,196,562 lb.	183,742 16 9
Glucose	7,844 „	5,428	704,411 „	2,935 0 11
Molasses and treacle	22 „	22	2,877,510 „	5,994 16 3
Molasses and treacle, mixed with bone-black	250 „	63	..	..
Sulphur	10,971 „	3,193	..	..
Tanning materials, crude—				
Bark	4,330 tons	43,955	..	..
Other kinds	..	5,497	..	..
Tar	..	3,151	..	..
Tarpaulins and tents, &c.	..	296	£294	58 16 0
Tea	5,181,995 lb.	204,236	5,232,721 lb.	43,606 0 2
Textile piece-goods other than silk, cotton, linen, or woollen	..	33,868	£34,373	6,874 10 4
Articles made up from, other than apparel	..	14,815	£14,556	3,638 18 6
Timber—				
Laths and shingles	1,048,542 No.	1,191	1,048,542 No.	104 17 1
Logs	3,789 „	11,387	..	..
Logs, hewn	4,463,145 sup. ft.	52,654	..	..
Palings	536,251 No.	3,281	534,250 No.	534 5 0
Posts	11,846 „	416	11,703 „	46 16 3
Rails	5,992 „	187	5,702 „	11 8 1
Sawn, undressed	10,658,771 sup. ft.	90,586	9,714,000 sup. ft.	9,714 0 0
Sawn, dressed	119,857 „	2,859	117,408 „	234 16 4
Unenumerated	..	936	..	..

GENERAL IMPORTS INTO THE COLONY OF NEW ZEALAND DURING 1903—*continued.*

Articles.	Total Quantities Imported.	Value of Total Imports.	Entered for Home Consumption on Importation and ex Warehouse.	Amount of Duty received, including Preferential.
		£		£ s. d.
Tin—				
Block	3,002 cwt.	19,564	..	..
Foil	29,066 lb.	1,668	..	..
Sheet	48,179 cwt.	40,523	..	..
Tinware	..	13,506	£13,222	3,305 10 7
Tinsmiths' furnishings and fittings	..	2,387	..	..
Tobacco—				
Unmanufactured	65,272 lb.	3,220	38,314 lb.	3,831 8 10
Manufactured	2,047,587 „	167,293	1,819,403 „	318,395 9 6
Cigars	78,888 „	28,640	78,480 „	27,467 17 4
Cigarettes	235,039 „	61,211	90,859,219 No. 14,387 oz.	79,501 16 4 359 13 4
Snuff	1,066 „	114	1,452 lb.	508 4 0
Tobacco-pipes and cases, &c.	..	33,347	£33,460	8,365 0 0
Tools and implements—				
Axes and hatchets	..	7,668	..	..
Engineers' machine tools	..	25,363	..	..
Scythes	..	1,662	..	..
Sheep-shears	..	3,281	..	..
Spades, shovels, and forks	..	13,702	..	..
Unenumerated	..	98,076	..	..
Tramway plant	..	19,745	£19,702	3,940 8 0
Turpentine, driers, and terebine	57,982 galls.	10,281	..	..
Twine	590,090 lb.	17,764	£17,104	3,420 16 9
Nets and netting	..	1,343	£1,343	268 12 0
Binder	941 cwt.	2,273	..	..
Unenumerated	..	125	..	..
Umbrellas and parasols	..	18,905	£18,823	3,764 13 0
Materials for	..	5,126	..	..
Varnish and gold-size	43,425 galls.	20,164	42,828 galls.	4,282 16 4
Vegetables, fresh, dried, or preserved	..	1,776	£1,714	342 15 6
Vinegar	42,095 galls.	3,812	43,780 galls.	1,094 10 0
Watches	38,261 No.	19,188	£17,824	3,564 14 8
Watchmakers' materials	..	597	..	..
Wax—				
Beeswax	81 cwt.	553	..	..
Paraffin, &c.	1,232,524 lb.	15,496	1,231,506 lb.	3,848 9 2
Unenumerated	4,636 „	172	4,500 „	28 2 6
Whiting and chalk	12,352 cwt.	1,394	12,346 cwt.	617 6 2
Wine—				
Australian	49,814 galls.	17,322	50,950 galls.	12,737 11 1
Sparkling	9,289 „	17,017	10,069 „	4,531 0 3
Other kinds	67,893 „	23,221	61,475 „	18,442 8 7
Woodenware	..	25,835	£17,502	3,500 7 1
Mouldings	..	22,466	£21,298	3,194 14 0
Wool—				
Greasy	119,552 lb.	2,274	..	..
Scoured	9,633 „	553	..	..
Washed	350 „	8	..	..

GENERAL IMPORTS INTO THE COLONY OF NEW ZEALAND DURING 1903—*continued.*

Articles.	Total Quantities Imported.	Value of Total Imports.	Entered for Home Consumption on Importation and ex Warehouse.	Amount of Duty received, including Preferential.
		£		£ s. d.
Woollen piece-goods ..	..	400,206	£396,814	79,362 16 2
Blankets	19,899 pairs	8,504	£8,358	1,671 12 2
Woolpacks	45,153 doz.	43,547	..	..
Woolpockets	1,421 „	1,177	..	..
Yarns	..	10,691	£10,691	2,138 2 0
Coir, flax, and hemp ..	..	2,006	..	..
Zinc manufactures—				
Tiles, ridging, &c. ..	..	155	£155	31 0 0
Unenumerated ..	..	97	£28	7 1 3
Zinc—				
Perforated sheet ..	350 cwt.	733	..	..
Plain sheet	8,110 „	10,694	..	..
Spelter	3,569 „	4,253	..	..
Minor articles	..	8,164	..	..
Articles and materials suited only for and to be used solely in the fabrication of goods within the colony	..	26,606	..	..
Miscellaneous goods—				
Manufactured	..	18,230	..	..
Steamers in sections ..	2 No.	3,450		
Goods unmanufactured..	..	5,139	..	..
Parcels-post	..	151,236	..	31,031 18 4
EXCISE DUTIES.				
Tobacco, manufactured ..	..	..	33,024 lb.	1,651 4 0
Cigars	..	..	1,545 „	115 18 3
Cigarettes made by hand ..	..	..	311 „	15 11 0
Cigarettes made by machinery	..	..	1,912 „	239 1 3
Pharmacopœia tinctures, essences, extracts, and medicinal spirits containing more than 50 per cent. of proof spirits	..	..	90,138 lb.	3,380 3 5
Pharmacopœia tinctures, essences, extracts, and medicinal spirits containing less than 50 per cent. of proof spirits	..	..	1,449 lb.	18 2 4
Culinary and flavouring essences	..	..	269 galls.	161 12 2

The Cook Islands and Niue, or Savage Island, now part of New Zealand, have not been considered in the table of imports made up by the Department of Trade and Customs. Details of goods received from those islands in 1903 are given on page 167.

Customs Revenue.

The Customs and excise duties received during the last five years are shown in detail, also the rate of revenue per head of mean population, inclusive and exclusive of Maoris, for each year:—

—	1899.	1900.	1901.	1902.	1903.
Customs Duties.	£	£	£	£	£
Spirits	414,395	442,090	478,816	483,582	498,256
Wine	32,045	33,614	35,864	36,745	35,710
Ale, Beer, &c.	17,594	17,562	18,849	20,152	20,413
Cigars, Cigarettes, and Snuff	77,810	82,357	90,490	94,992	107,838
Tobacco	263,057	279,651	296,016	294,272	322,227
Tea	79,975	68,960	45,905	42,405	43,606
Coffee, Cocoa, &c.	6,968	5,285	4,647	5,288	5,951
Sugar and Molasses	162,787	168,876	173,055	185,484	192,675
Opium	6,139	6,426	6,618	*271	*192
Other Goods by Weight	192,987	178,554	151,286	166,687	184,951
" *ad valorem*	682,722	775,649	808,531	867,209	982,800
Other Duties	91,155	94,687	59,316	65,219	76,245
Parcels-post	14,368	16,643	22,405	22,737	31,032
Totals, Customs Duties	2,042,002	2,170,354	2,191,798	2,285,043	2,501,896
Excise Duties.					
Tinctures—New Zealand	†2,036	‡1,638	§2,198	‖2,454	¶3,560
Cigars, Cigarettes, and Snuff—New-Zealand-manufactured	91	129	174	190	371
Tobacco — New-Zealand-manufactured	2,323	2,376	2,596	2,096	1,651
Beer—New Zealand	78,265	85,141	89,185	89,742	94,440
Totals, Excise Duties	82,715	89,284	94,153	94,482	100,022
Revenue from Customs Duties per head of mean population (excluding Maoris)	£ s. d. 2 14 5	£ s. d. 2 16 10	£ s. d. 2 16 4	£ s. d. 2 17 3	£ s. d. 3 1 0
Ditto (including Maoris)	2 11 8	2 14 0	2 13 5	2 14 4	2 17 10
Revenue from Excise Duties per head of mean population (excluding Maoris)	0 2 2·5	0 2 4	0 2 5	0 2 4·4	0 2 5·3
Ditto (including Maoris)	0 2 1·1	0 2 2·7	0 2 3·5	0 2 3	0 2 3·8

* See remarks on page 190. † Including £149 excise duty on culinary and flavouring essences, and £11 on perfumed spirits. ‡ Including £89 excise duty on culinary and flavouring essences. § Including £173 duty on culinary and flavouring essences, and £19 on perfumed spirits. ‖ Including £183 excise duty on culinary and flavouring essences, £5 perfumed spirits, and £1 toilet preparations. ¶ Including £162 excise duty on culinary and flavouring essences.

The Customs revenue for the year 1903 amounted to £2,501,896, and the excise duties to £100,022. The revenue from Customs was £3 1s. per head of population excluding Maoris, and £2 17s. 10d. if they be included. In 1888 the Customs revenue was £2 6s. 2d. per head of European population, and from that time the proportion increased slowly year by year until 1892, when it reached

£2 11s. 6d. per head. During the next two years there was a falling-off; but 1895 and following years, except for a slight fall in 1901, show increases, the proportion for 1903 being higher than in any year since 1878. Details for fourteen years are given :—

CUSTOMS REVENUE PER HEAD OF EUROPEAN POPULATION.

	£	s.	d.		£	s.	d.
1890	2	9	3	1897	2	13	0
1891	2	9	7	1898	2	13	3
1892	2	11	6	1899	2	14	5
1893	2	10	4	1900	2	16	10
1894	2	6	4	1901	2	16	4
1895	2	6	9	1902	2	17	3
1896	2	9	11	1903	3	1	0

Dating from 1890, the taxation by way of Customs and excise duties together increased from £2 11s. 2d. in that year to £2 19s. 2d. in 1900, declined to £2 18s. 9d. in 1901, increasing again to £2 19s. 7d. in 1902, and, further, to £3 3s. 5d. in 1903.

Besides an alteration of tariff in 1895 in certain items, in the year 1900 certain duties were lowered and exemptions granted. The duty on tea was brought to 2d. per pound, instead of 4d.; currants and raisins were lowered to 1d. per pound; candles to 1d.; cocoa and roasted coffee to 3d. There was also reduction on stearine for match-making, on paraffin-wax, and wax matches. The duty on patent and proprietary medicines was made 15 per cent., also that on certain drugs and chemicals, while the charge on steam-engines, or parts thereof, became 5 per cent. Various exemptions came into force.

With these circumstances there has been a greater import of taxable articles, which would seem to indicate that purchasing power had increased. It is at least certain that the value of imports rose from £5,990,177 (excluding specie), in 1894, to £12,075,959 in 1903, while the changes of tariff were effected.

The Customs revenue for 1903 was increased by the sum of £222 17s. 4d. in consequence of "The Preferential and Reciprocal Trade Act, 1903." The preferential duties which have been imposed on articles not British produce or manufacture are stated on page 101, following the main tariff, and the provisions of the Act as to reciprocity, &c., will be found set out in a special article in Part III. But for convenience, a full statement is also given of the original rates and additional duties further on in this section.

The tariff (general and preferential), as before stated, has been given in full in Part I. (see pages 84 to 102). The rates of duty levied include 16s. per gallon on spirits; 30s. per gallon on perfumed spirits; 7s. per pound on cigars and snuff; 17s. 6d. per 1,000, of 2½lb. and under, and 6d. per ounce weight over 2½ lb. per 1,000, on cigarettes; also 3s. 6d. per pound on manufactured and 2s. on unmanufactured tobacco. Sparkling wine is charged 9s. a gallon; Australian, 5s.; other kinds, 6s.; ale and beer, 2s. The duty on cocoa, chocolate, and chicory is 3d. per lb.; raw coffee, 2d.; roasted, 3d. Tea produced in British dominions is free (from the 31st March) except in packets not exceeding

1 lb. in weight, when the duty is 2d. per lb., and the same duty is chargeable on tea of foreign production. Sugar, molasses, and treacle pay ½d., and glucose 1d. per pound. Opium is charged 40s. per pound, but this article, in a form suitable for smoking, cannot now be legally imported. The Opium Prohibition Acts, 1901 and 1902, make the importation or possession of opium suitable for smoking illegal. The remainder of the Customs revenue, with small exception, is made up of charges on goods by weight, *ad valorem* duties, ranging from 5 to 40 per cent., and receipts from the foreign parcels-post. There is also an excise duty of 1s. per pound on tobacco; 1s. 6d. per pound on cigars, cigarettes, and snuff; 3d. per gallon on beer; 9d. per pound on tinctures, &c., manufactured in the colony, containing more than 50 per cent. of proof spirit, and 3d. per pound when less than 50 per cent. Also, 12s. per gallon on culinary and flavouring-essences; and 20s. on perfumed spirits.

By "The Tobacco Excise Duties Act, 1896," the excise duty on cigarettes made in the colony is now (from the 31st December, 1896) 2s. 6d. per pound on machine-made and 1s. per pound on hand-made cigarettes.

"The Tobacco Act Amendment Act, 1896," enacts that all packages of manufactured tobacco shall be labelled before leaving the manufactory, and provides for the issue of warrants to use cutting-machines for cutting duty-paid manufactured tobacco for sale (or to be used in the manufacture of cigarettes by hand), and to manufacture cigarettes by hand, under certain conditions.

The duties authorised by "The Timber Export Act, 1901," and "The Timber Export Duty Act, 1903," will be found given on page 100 in detail, with the full tariff.

"The Preferential and Reciprocal Trade Act, 1903."

The following goods are liable to an additional duty under the above Act when not the produce or manufacture of some part of the British dominions:—

—	Rate prescribed by the Tariff.	Additional Duty when of Foreign Production or Manufacture.
Cement	2s. the barrel	2s. the barrel.
Basket and wickerware n.o.e., not being furniture	20 p.c. *ad val.*	10 p.c. *ad val.*
Bicycles, tricycles, and the like vehicles; also finished or partly finished or machined parts of same n.o.e., including weldless steel tubing cut to short lengths	20 " ..	10 "
Boots, shoes, and slippers n.o.e.; goloshes, clogs, pattens, vamps, uppers, and laces	22½ " ..	11¼ "
Candles	1d. the lb. or package of that reputed weight	½d. the lb. or package of that reputed weight.

—	Rate prescribed by the Tariff.	Additional Duty when of Foreign Production or Manufacture.
Carriages, carts, drays, wagons, perambulators, and wheels for the same	20 p.c. *ad val.*	10 p.c. *ad val.*
China, porcelain, and parian ware	20 „ ..	10 „
Clocks	20 „ ..	10 „
Cordage and rope n.o.e.	20 „ ..	10 „
Cream of tartar	1d. the lb. ..	½d. the lb.
Earthenware, stoneware, and brown ware ..	20 p.c. *ad val.*	10 p.c. *ad val.*
Fancy goods and toys	20 „ ..	10 „
Firearms, all kinds	20 „ ..	10 „
Fish, potted and preserved	2d. the lb. or package of that reputed weight	1d. the lb. or package of that reputed weight.
Furniture and cabinetware n.o.e., and other than iron	25 p.c. *ad val.*	12½ p.c. *ad val.*
Glass, crown, sheet, and common window ..	2s. the 100 sup. ft.	1s. the 100 sup. ft.
Glassware; also plate glass, and glass polished, coloured, and other kinds n.o.e.; globes and chimneys for lamps	20 p.c. *ad val.*	10 p.c. *ad val.*
Hardware, ironmongery, and holloware ..	20 „	10 „
Hops	6d. the lb. ..	3d. the lb.
Iron nails	2s. the cwt. ..	1s. the cwt.
Iron pipes, and fittings for same, including main-cocks	5 p.c. *ad val.*	2½ p.c. *ad val.*
Lamps, lanterns, and lamp-wicks	20 „	10 „
Musical instruments—viz., pianos	20 „	10 „
Paperhangings	15 „	7½ „
Paper, wrapping—viz., blue candle, glazed cap, glazed casings, small-hand, lumber-hand, and tissue	5s. the cwt. ..	2s. 6d. the cwt.
Paper, wrapping, other kinds, including brown, cartridge, and sugar papers	5s. „ ..	2s. 6d. „
Plate and plated ware	20 p.c. *ad val.*	10 p.c. *ad val.*
Pumps and other apparatus for raising water	20 „	10 „
Bicycles and tricycles, fittings for — viz., rubber tires, pneumatic tires, outside covers, and inner tubes; rubber and cork handles, and pedal-rubbers; also drop-forgings and stampings, ball-bearings, weldless steel tube in full lengths, rims, forks, and spokes in the rough	Free ..	20 „
Gas engines and hammers, and oil engines ..	„ ..	20 „
Gum boots	„ ..	20 „
Iron and steel cordage	„ ..	20 „
Iron, plain black sheet, rod, bolt, bar, and plate	„ ..	20 „
Printing-paper*	„ ..	20 „
Rails for railways and tramways*	„ ..	20 „
Sail-cloth, canvas, and unbleached double-warped duck	„ ..	20 „
Surgical and dental instruments and appliances	„ ..	20

* See extract on next page.

Extract from "The Preferential and Reciprocal Trade Act, 1903."

Exemptions from provisions of sections 2 and 3.

4. The provisions of sections two and three hereof shall not be applicable in the case of—

(*a.*) Goods imported on or before the thirty-first day of March, one thousand nine hundred and four, if it is proved to the satisfaction of the Collector that an order for the goods was *sent from New Zealand* on or before the sixteenth day of November, one thousand nine hundred and three.

(*b.*) Printing-papers imported by and for the use of the proprietors of any registered newspaper, if it is proved to the satisfaction of the Collector that they are imported under a valid contract for the supply of such papers for a period not exceeding three years, entered into prior to the sixteenth day of November, one thousand nine hundred and three.

(*c.*) Rails for tramways and other goods mentioned in the Schedules hereto directly imported before the thirty-first day of March, one thousand nine hundred and six, for use in the construction or equipment of any tramway for which plans and specifications have been completed or are in course of preparation on the passing of this Act.

Tea produced in British dominions is free (from the 31st March) except in packets not exceeding 1 lb. in weight, when the duty is 2d. per lb., and the same duty is chargeable on all tea of foreign production.

In connection with the subject of preferential duties, tables are annexed to illustrate the position in regard to two specially selected important foreign States at the time the additional duties were authorised. The table for United States also exhibits the fact that free goods have been introduced at a far greater rate than those which paid duty since the year 1896 :—

IMPORTS FROM UNITED STATES OF AMERICA.

Year.	On the East Coast.		On the West Coast.		Total Imports.	
	Admitted Free of Duty.	On which Duty Payable.	Admitted Free of Duty.	On which Duty Payable.	Admitted Free of Duty.	On which Duty Payable.
	£	£	£	£	£	£
1896 ..	127,235	292,454	20,663	52,488	147,898	344,942
1897 ..	155,730	366,209	24,906	81,199	180,636	447,408
1898 ..	282,332	418,223	27,477	72,379	309,809	490,602
1899 ..	250,656	437,250	31,359	56,044	282,015	493,294
1900 ..	377,569	580,717	42,567	61,020	420,136	641,737
1901 ..	618,312	556,433	146,023	94,492	*764,335	650,925
1902 ..	527,525	619,050	53,661	118,701	581,186	737,751
1903 ..	522,581	716,954	57,430	144,393	580,011	861,347

* Of this sum £100,497 value was for Government uses.

Another list shows imports from Germany, in which the greatest items are musical instruments, fancy goods, hardware and machinery, and paper :—

IMPORTS FROM GERMANY, 1896–1903.

Year.	Admitted Free of Duty.	On which Duty Payable.	Proportions per Cent.	
			Admitted Free of Duty.	On which Duty Payable.
	£	£		
1896	23,404	77,977	23·08	76·92
1897	29,101	127,965	18·53	81·47
1898	29,957	123,145	19·57	80·43
1899	34,937	125,668	21·76	78·24
1900	39,149	142,925	21·50	78·50
1901	40,377	158,144	20·33	79·67
1902	46,084	164,476	21·89	78·11
1903	70,191	204,106	25·59	74·41

To show the nature of the imports from the United States of America and Germany, two statements, giving the articles and values thereof for the year 1903, are introduced.

Examining the figures for the United States, it will be found that tobacco to the value of £169,114 was imported into New Zealand last year; boots and shoes, £102,054; oils, £129,708; hardware, &c., iron and steel, with machinery, tools and implements, &c., came to £406,487. The rest is a very miscellaneous list of articles, to which paper and fruit contributed more than £40,000 each.

LIST OF PRINCIPAL ARTICLES IMPORTED FROM UNITED STATES OF AMERICA IN 1903.

	£		£
Apparel and slops	14,306	Firearms	4,925
Automobiles, motor-cars, and motor-cycles	7,443	Fish, potted and preserved ..	17,635
Bicycles and tricycles ..	17,310	Flour	6,677
Bicycles and tricycles, materials for	10,974	Fruits, bottled and preserved	12,160
Books, &c., printed ..	8,513	Fruits, dried	24,192
Boots and shoes	102,054	Fruits, fresh	4,098
Building materials ..	2,516	Furniture, cabinetware, and upholstery	14,206
Candles	14,482	Furniture, knife, and plate powder and polish ..	3,185
Canvas	9,639	Glass bottles, empty ..	4,206
Cards, playing	1,731	Glassware	11,461
Carriages	6,217	Grindery	3,553
Carriages, &c., materials for	17,483	Gum boots	5,659
Cartridges, shot (10-24 bore)	6,981	Haberdashery	3,931
Cartridges n.o.e.	5,275	Hardware, holloware, and ironmongery	56,569
Carts, drays, and wagons ..	2,711	Hops	2,025
Clocks	9,276	Indiarubber goods	1,853
Confectionery	3,216	Ink	1,462
Cordage	1,780	Instruments, musical ..	9,540
Cotton piece-goods	10,209	Instruments, other kinds ..	15,911
Drapery	2,754	Iron and steel	57,315
Drugs, chemicals, and druggists' wares	13,106	Lamps, lanterns, and lampwick	9,612
Fancy goods	18,252	Leather	24,699
Felt sheathing	1,938		

List of Principal Articles Imported from United States of America in 1903—*continued.*

	£
Machinery and machines—	
Agricultural and dairying	67,176
Electrical	9,819
Gas-engines	25,780
Mining	3,271
Printing	2,667
Refrigerating	4,196
Sewing and knitting	27,119
Typewriters	3,807
Woodworking	9,747
Other	26,169
Maizena and cornflour	2,587
Manures	4,212
Medicines, patent and proprietary	17,225
Metal, manufactures of	12,342
Nails	20,768
Oil, kerosene	99,821
Oil, other kinds	29,887
Paints	5,517
Paper, printing	40,909
Paper, other	9,862
Perfumery	2,451
Pictures, engravings, &c.	2,228
Plate and plated ware	3,245
Photographic goods	4,872
Pumps	3,401
Railway plant	10,393
Resin	3,229
Saddlery and harness	4,437
Sausage-skins	9,399
Seeds	25,349
Soap	8,124
Stationery	12,170
Sugar, glucose	4,412
Timber	4,201
Tobacco	169,114
Tools and implements	57,185
Tramway plant	12,164
Turpentine, driers, and terebine	7,247
Varnish	2,334
Watches	2,095
Wax	11,752
Woodenware	22,767
Other imports	52,869
	£1,441,358

List of Principal Articles Imported from Germany in 1903.

	£
Acids	1,876
Apparel and slops	5,362
Basketware and wicketware	1,042
Bicycles and tricycles, materials for	3,903
Boots and shoes	2,704
Brushware and brooms	1,394
China, porcelain, and parianware	4,685
Clocks	1,354
Cotton piece-goods	3,158
Drapery	5,449
Drugs, chemicals, and druggists' wares	5,211
Earthenware	2,864
Fancy goods	25,333
Firearms	1,034
Furniture, cabinetware, and upholstery	6,429
Glass	7,869
Glassware	7,511
Hardware, hollowware, and ironmongery	10,847
Hosiery	2,450
Instruments, musical	55,467
Iron and steel	3,660
Lamps, lanterns, and lampwick	3,454
Leather and leather manufactures	1,356
Machinery and machines	10,410
Manures	7,501
Matches	1,224
Nails	2,359
Paper	15,865
Photographic goods	1,248
Seeds	4,964
Spirits	2,829
Spirits of wine	1,294
Stationery	6,283
Tobacco	4,812
Tobacco pipes	1,226
Twine	2,996
Woodenware	6,694
Other imports	40,180
	£274,297

SECTION V.—EXPORTS AND TOTAL TRADE.

The quantities and values of exports used in making up the figures given in this portion of the statistical information are obtained from Customs entries. In estimating the value of exports the "free on board in New Zealand" value is given, and, as regards the main items, the Collector of Customs examines carefully the amounts stated, and compares them with current price-lists, to prevent any over-estimate As a further safeguard, the values of wool, frozen meat, oats, wheat, tallow, phormium fibre, butter, and cheese are submitted to the various Chambers of Commerce for their approval prior to the publication of the figures. Goods transhipped are regarded as destined for the country where it is intended to land them.

The value of all the exports in 1903, inclusive of specie (£38,452), was £15,010,378. The value of New Zealand produce exported, £14,838,192: gives an average of £18 1s. 10d. per head of population, against £16 18s. 5d. for the previous year. The increase in the value of exports of New Zealand produce for 1903 in respect of that for 1902 amounts to £1,339,593, or 9·92 per cent.

The values of exports for the years 1893 and 1903 to the United Kingdom, the Australian States, with other British possessions, and to foreign countries, show the extent and development of outward trade in regard to its distribution:—

Countries.	1893. £	1903. £
United Kingdom	7,036,515	11,345,075
New South Wales	678,904	974,460
Victoria	527,500	1,068,751
Queensland	28,316	37,289
Western Australia	6,525	100,759
South Australia	19,439	29,239
Tasmania	14,106	23,498
Other British possessions	71,356	587,612
United States	496,548	669,649
Other foreign ports	106,155	174,046
	£8,985,364	£15,010,378

A comparative table showing the values of New Zealand domestic exports, according to their nature, for sixteen years will be found further on, with comments. The development for the period, expressed in money value, is from seven millions and a quarter to nearly fifteen millions.

But first a comparative statement of exports according to value for the last two years is given, showing the amounts for various principal articles, being the produce or manufacture of the colony, classified in groups:—

VALUE OF PRINCIPAL ARTICLES EXPORTED, 1902 AND 1903.

	Year 1902.	Year 1903.	Increase in 1903.	Decrease in 1903.
THE MINE.	£	£	£	£
Coal	154,747	128,927	..	25,820
Gold	1,951,426	2,037,832	86,406	..
Silver and minerals	77,038	98,845	21,807	..
Total	2,183,211	2,265,604	82,393	..
THE FISHERIES.				
Fish	16,015	16,447	432	..
Oysters	2,867	2,445	..	422
Other	1,542	2,343	801	..
Total	20,424	21,235	811	..
THE FOREST.				
Fungus	10,257	9,290	..	967
Kauri-gum	450,223	631,102	180,879	..
Timber—				
Sawn and hewn	208,005	240,713	32,708	..
Other	2,477	4,152	1,675	..
Total	670,962	885,257	214,295	..
ANIMALS AND PRODUCE.				
Bacon and hams	18,590	14,678	..	3,912
Beef and pork (salted)	9,837	11,188	1,351	..
Butter	1,205,802	1,318,067	112,265	..
Cheese	163,539	194,998	31,459	..
Hides	44,546	55,216	10,670	..
Live-stock	113,959	39,076	..	74,883
Preserved meats	123,534	96,217	..	27,317
Frozen meat	2,718,763	3,197,043	478,280	..
Rabbit-skins	52,566	40,727	..	11,839
Sausage-skins	61,167	65,385	4,218	..
Sheepskins and pelts	375,876	468,969	93,093	..
Tallow	550,131	517,871	..	32,260
Wool	3,354,563	4,041,274	686,711	..
Other	11,995	14,254	2,259	..
Total	8,804,868	10,074,963	1,270,095	..
AGRICULTURAL PRODUCTS.				
Bran and sharps	39,523	26,948	..	12,575
Chaff	1,705	2,806	1,101	..
Flour	3,613	2,736	..	877
Grain—				
Barley	25,062	26,917	1,855	..
Beans and peas	22,097	35,066	12,969	..
Maize	40,417	3,656	..	36,761
Malt	705	269	..	436
Oats	666,664	453,702	..	212,962
Wheat	31,074	14,068	..	17,006
Hops	14,292	21,826	7,534	..
Oatmeal	21,578	13,273	..	8,305
Potatoes	72,807	13,028	..	59,779
Seeds (grass and clover)	84,861	109,049	24,188	..
Other kinds	21,588	21,501	..	87
Total	£1,045,986	£744,845	..	£301,141

VALUE OF PRINCIPAL ARTICLES EXPORTED, 1902 AND 1903—*continued.*

	Year 1902.	Year 1903.	Increase in 1903.	Decrease in 1903.
MANUFACTURES.	£	£	£	£
Apparel	2,267	2,520	253	..
Leather	92,636	94,024	1,388	..
Phormium fibre	534,031	595,684	61,653	..
Woollen manufactures ..	6,664	5,015	..	1,649
Other manufactures	119,634	126,115	6,481	..
Total	755,232	823,358	68,126	..
Miscellaneous	17,916	22,930	5,014	..
Total exports (colonial produce and manufactures) ..	13,498,599	14,838,192	1,339,593	..
Specie	9,518	38,452	28,934	..
Other exports (British and foreign)	136,860	133,734	..	3,126
Total exports ..	£13,644,977	£15,010,378	£1,365,401	..

The class designated "Animals and Produce" shows by far the greatest value, the sum for 1903 being £10,074,963, which includes £4,041,274 for wool and £3,197,043 for frozen meat. The total value of exports in this class increased during the year by £1,270,095, on a total of £8,804,868 in 1902.

Although the value of wool exported in 1903 is greater than that for the previous year, the quantity will be found to have decreased.

"The Mine" takes second place among the classes for total value, with an export of coal, gold, silver, and other minerals amounting to £2,265,604 for 1903, being an increase of £82,393 on £2,183,211, the export for the previous year.

"Agricultural Products," principally grain, potatoes, and seeds, take third place, but show a decrease of £301,141 on the value exported in 1902, oats, potatoes, maize, and wheat falling off considerably.

"The Forest" shows an export for last year valued at £885,257, which gives an increase of £214,295 on the figures for the previous year.

"Manufactures" are set down at £823,358 in 1903, being £68,126 more than in the previous year. Phormium fibre shows an increase on the operations for 1902 of £61,653. Woollen manufactures sent abroad decreased by £1,649, leather increased by £1,388, and apparel, with other manufactures, by £6,734.

The smallest group in respect to value is "The Fisheries." The total for the group was £21,235, last year, an increase of £811 on the value of similar exports in 1902.

The exports of New Zealand produce or manufacture for the two last years have also to be considered in relation to quantity, and the articles are again grouped in the next table according to the same classification as that used for purposes of comparing the values.

QUANTITIES OF THE PRINCIPAL ARTICLES OF NEW ZEALAND PRODUCE EXPORTED.

Items.		Year 1902.	Year 1903.	Increase in 1903.	Decrease in 1903.
The Mine:—					
Coal	Tons	188,677	152,332	..	36,345
Gold	Oz.	507,852	533,314	25,462	..
Silver	"	674,196	911,914	237,718	..
Minerals	Tons	607	701	94	..
The Fisheries:—					
Fish	Cwt.	9,611	10,001	390	..
Oysters	Doz.	339,685	294,690	..	44,995
Whalebone ..	Lb.	1,680	4,144	2,464	..
The Forest:—					
Fungus	Cwt.	4,632	4,280	..	352
Gum (kauri) ..	Tons	7,430	9,357	1,927	..
Timber (sawn and hewn)	s.ft.	49,251,549	57,097,990	7,846,441	..
Animals and Produce:—					
Bacon and hams ..	Cwt.	5,910	3,771	..	2,139
Beef and pork (salted)	"	8,020	7,572	..	448
Butter	"	253,998	285,106	31,108	..
Cheese	"	74,746	74,780	34	..
Hides	No.	45,038	53,347	8,309	..
Live-stock (cattle, horses, sheep, pigs)	"	52,743	22,715	..	30,028
Meats (preserved) ..	Cwt.	54,271	39,525	..	14,746
" (frozen) ..	"	2,138,557	2,378,650	240,093	..
Sausage-skins ..	"	13,398	14,521	1,123	..
Skins (rabbit) ..	No.	6,139,794	6,101,899	..	37,895
" (sheep) and pelts	"	6,144,680	7,142,531	997,851	..
Tallow	Cwt.	424,060	396,940	..	27,120
Wool	Lb.	160,419,023	155,128,381	..	5,290,642
Agricultural Products:—					
Bran and sharps ..	Tons	7,737	6,226	..	1,511
Chaff	"	356	768	412	..
Flour	"	370	249	..	121
Grain, barley ..	Bush.	151,360	154,137	2,777	..
" beans and peas	"	102,314	160,403	58,089	..
" maize ..	"	225,829	18,058	..	207,771
" malt ..	"	2,865	1,020	..	1,845
" oats ..	"	5,185,812	4,956,330	..	229,482
" wheat ..	"	194,671	71,700	..	122,971
Hops	Cwt.	4,311	3,873	..	438
Oatmeal	Tons	1,804	1,391	..	413
Potatoes	"	17,715	3,170	..	14,545
Seeds (grass and clover)	Bush*	246,389	345,324	98,935	..
Manufactures:—					
Ale and beer ..	Gals.	25,892	20,146	..	5,746
Cordage	Cwt.	820	757	..	63
Leather	Cwt.	15,469	15,465	..	4
Phormium fibre ..	Tons	20,852	22,652	1,800	..
Soap	Cwt.	5,770	8,042	2,272	..

* At 20 lb. to the bushel.

The numerical increases in such articles as butter, silver, frozen meat, sheepskins and pelts, beans and peas, timber, seeds, soa

phormium fibre, hides, and kauri-gum, are all most satisfactory, and in some cases very considerable; while, on the other hand, the export of coal, live-stock, preserved meats, tallow, wool, maize, malt, wheat, oats, and potatoes, with some other items, declined in 1903. The rates of increase and decrease for the principal articles are exhibited in the table following:—

INCREASES.

Export of	Rate of Increase per Cent. in 1903 over Quantity in 1902.	Export of	Rate of Increase per Cent. in 1903 over Quantity in 1902.
Whalebone .. Lb. ..	146·67	Timber .. Ft. ..	15 93
Chaff .. Tons ..	115·73	Minerals .. Tons ..	15·49
Beans and peas Bush. ..	56·78	Butter .. Cwt. ..	12·25
Seeds .. Bush. ..	40·15	Meat (frozen) .. Cwt. ..	11·23
Soap .. .. Cwt. ..	39·38	Phormium fibre Tons ..	8·63
Silver .. Oz. ..	35·26	Sausage-skins .. Cwt. ..	8·38
Kauri-gum .. Tons ..	25·94	Gold .. Oz. ..	5·01
Hides .. No. ..	18·45	Fish .. .. Cwt. ..	4·06
Sheepskins and pelts .. No. ..	16·24	Barley .. Bush. ..	1·83
		Cheese .. Cwt. ..	0·05

DECREASES.

Export of	Rate of Decrease per Cent. in 1903 over Quantity in 1902.	Export of	Rate of Decrease per Cent. in 1903 over Quantity in 1902.
Maize .. Bush. ..	92·00	Oysters .. Doz. ..	13·25
Potatoes .. Tons ..	82·11	Hops .. Cwt. ..	10·16
Malt .. Bush. ..	64·40	Cordage .. Cwt. ..	7·68
Wheat .. Bush. ..	63·17	Fungus .. Cwt. ..	7·60
Live-stock .. No. ..	56·93	Tallow .. Cwt. ..	6·40
Bacon and hams Cwt. ..	36·19	Beef and pork (salted) .. Cwt. ..	5·59
Flour .. Tons ..	32·70	Oats .. .. Bush. ..	4·43
Meats (preserved) Cwt. ..	27·17	Wool .. Lb. ..	3·30
Oatmeal .. Tons ..	22·89	Rabbitskins .. No. ..	0·62
Ale and beer .. Gals. ..	22·19	Leather .. Cwt. ..	0·03
Bran and sharps Tons ..	19·53		
Coal .. Tons ..	19·26		

The position as to value in respect of a period of sixteen years, 1888 to 1903 inclusive, is presented in a table giving the domestic exports for each. The most important items of export given under the heading "Other New Zealand Produce" are coal, silver, minerals, fish, oysters, fungus, kauri-gum, timber, bacon and hams, salted and preserved meats, tallow, sheep and rabbit skins, hides, sausage-skins, and live-stock. The aggregate value of these in 1903 was £2,437,096.

EXPORTS OF NEW ZEALAND PRODUCE.

Calendar Year.	Wool.	Gold.	Frozen Meat.	Butter and Cheese.	Agricultural Produce.	Manufactures	Other N.Z. Produce.	Total.
	£	£	£	£	£	£	£	£
1888	3,115,098	914,309	628,800	197,170	905,907	233,383	1,260,461	7,255,128
1889	3,976,375	785,490	783,374	213,945	1,424,297	569,880	1,288,647	9,042,008
1890	4,150,599	751,360	1,087,617	207,687	1,289,864	547,947	1,393,687	9,428,761
1891	4,129,686	1,007,172	1,194,724	236,933	894,467	420,357	1,516,755	9,400,094
1892	4,313,307	951,963	1,033,377	318,204	1,035,637	367,677	1,345,703	9,365,868
1893	3,774,738	915,921	1,085,167	354,271	716,546	345,636	1,365,164	8,557,443
1894	4,827,016	887,865	1,194,545	366,483	317,655	224,958	1,266,626	9,085,148
1895	3,662,131	1,162,181	1,262,711	378,510	326,029	188,702	1,409,889	8,390,153
1896	4,391,848	1,041,428	1,251,993	411,882	572,355	198,081	1,309,749	9,177,336
1897	4,443,144	980,204	1,566,286	553,122	495,175	197,601	1,360,735	9,596,267
1898	4,645,804	1,080,691	1,698,750	539,466	410,677	253,805	1,695,795	10,324,988
1899	4,324,627	1,513,180	2,088,856	713,617	913,678	378,066	1,867,716	11,799,740
1900	4,749,196	1,439,602	2,123,881	969,731	1,230,565	549,342	1,992,932	13,055,249
1901	3,699,103	1,753,784	2,253,262	1,121,091	1,532,386	425,142	1,905,692	12,690,460
1902	3,354,563	1,951,426	2,718,763	1,369,341	1,045,986	755,232	2,302,288	13,498,599
1903	4,041,274	2,037,832	3,197,043	1,513,065	744,845	823,358	2,480,775	14,838,192

The preceding table shows that the value of the exports of New Zealand produce fell from £9,428,761 in 1890 to £8,390,153 in 1895, then rose to £13,055,249 in 1900, and had in 1903 increased to £14,838,192, the highest value yet attained in any one year.

Thus there was a net increase of exports, since 1895, to the value of £6,448,039, all New Zealand produce. With the amount of increase in money must be considered the state of prices of the various kinds of produce.

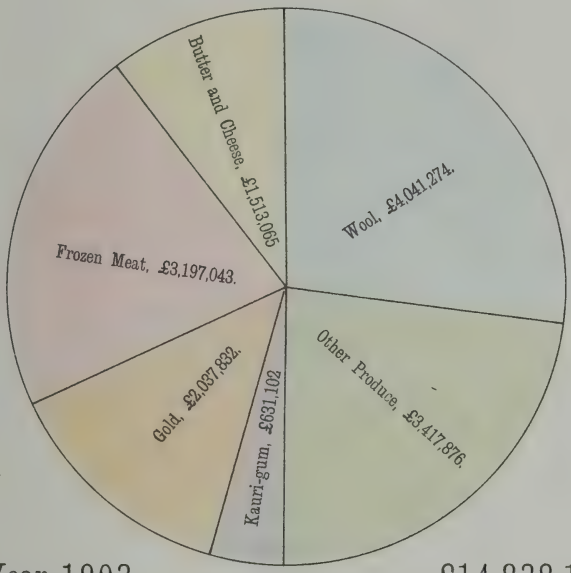
The export of wool, measured by quantity, rose from 102,817,077 lb. in 1890 to 155,128,381 lb. in 1903, or at the rate of 50·88 per cent., and that of frozen meat from 898,894 cwt. to 2,378,650 cwt.

Gold, too, which was exported to the quantity of 187,641 oz. in 1890, increased to 533,314 oz. in 1903, the rate of increase being 184·22 per cent.

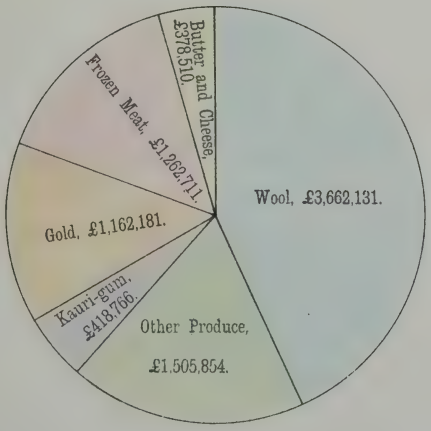
A comparison for ten years of the value of the export trade with the United Kingdom, British colonies and possessions, and foreign countries exhibits an increase of about 100 per cent. in case of exports to foreign States, against a rise of 200 per cent. in value of goods sent to British possessions, calculated on very much greater figures. The exports to the United Kingdom have risen about 40 per cent. in the decade.

EXPORTS.

RISE IN VALUE OF EXPORTS OF NEW ZEALAND PRODUCE, 1895-1903.



Year 1903. £14,838,192.



Year 1895. £8,390,153.

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Year.	Exports to United Kingdom.	British Colonies and Possessions.	Foreign States.
	£	£	£
1894	7,903,493	925,231	402,323
1895	7,045,646	1,091,062	413,516
1896	7,541,981	1,346,544	432,580
1897	8,168,123	1,380,502	468,368
1898	8,265,499	1,532,511	719,945
1899	9,427,515	1,850,239	660,581
1900	10,259,342	2,332,780	654,039
1901	9,295,375	2,907,412	678,637
1902	9,450,648	3,577,815	616,514
1903	11,345,075	2,821,608	843,695

Re-exports.

The re-export trade of the colony would seem from the sub-joined figures to have been almost stationary for the last fourteen years, the figures for 1890 and 1903 only differing by a sum of £6,821. The re-exports of merchandise in 1903 were valued at £133,734, or less than 1 per cent. of the total exports, excluding specie.

EXPORTS OF BRITISH, FOREIGN, AND OTHER COLONIAL PRODUCE (EXCLUDING SPECIE).

	£		£
1890	140,555	1897	144,955
1891	160,765	1898	124,850
1892	125,052	1899	123,682
1893	123,402	1900	168,009
1894	136,402	1901	179,350
1895	127,966	1902	136,860
1896	122,571	1903	133,734

With these sums may be contrasted the re-export trade of New South Wales—a State having somewhat less than double the population of New Zealand—which, exclusive of specie, amounted in 1902 to £3,131,914, or no less than 15·77 per cent. of the value of all goods exported.

Exports from the North and Middle Islands.

The exports from the North and Middle Islands respectively, excluding "Parcels-post," during the last five years were as under:—

Year.	North Island.	Middle Island.	Proportion to Total Export.	
	£	£	North Island.	Middle Island.
1899	6,011,239	5,916,290	50·40	49·60
1900	6,707,964	6,526,397	50·70	49·30
1901	6,077,724	6,787,546	47·24	52·76
1902	7,085,275	6,543,389	51·99	48·01
1903	7,994,227	6,995,307	53·33	46·67

The North Island exported in 1903 more than half of the total for the two Islands.

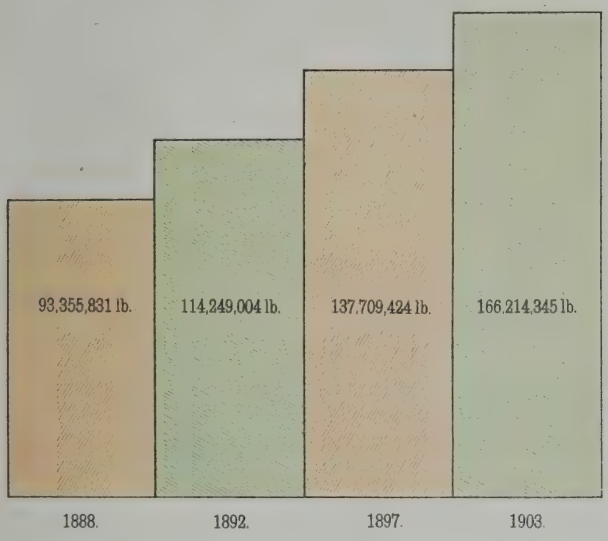
Exports to Different Countries.

The following are the values of exports to different countries or places in 1903 and 1902, arranged in order of magnitude of increase or decrease in the later year to each :—

Country, Colony, State, &c.	1903. £	1902. £	Increase. £
United Kingdom	11,345,075	9,450,648	1,894,427
United States of America ..	669,649	489,964	179,685
Cape Colony	118,616	79,213	39,403
Argentine Republic	30,941	542	30,399
France	13,435	15	13,420
Germany	17,584	9,389	8,195
Bengal	4,076	1,728	2,348
Fiji	61,717	59,690	2,027
Falkland Islands	1,912	15	1,897
Holland	1,565	42	1,523
Fanning Island	1,519	..	1,519
New Hebrides	1,489	125	1,364
Solomon Islands	1,332	..	1,332
Belgium	985	394	591
Portuguese East Africa ..	1,578	1,045	533
Ceylon	819	377	442
Singapore	663	284	379
China	330	42	288
New Caledonia	2,292	2,011	281
Switzerland	313	42	271
Sweden	402	166	236
Denmark	6,098	5,966	132
Transvaal Colony	230	122	108
Ocean Island	78	..	78
Bombay	129	54	75
Antarctic Regions	60	..	60
Malden Island	58	1	57
Austria	66	12	54
New Britain	649	595	54
New Guinea	20	..	20
Uruguay	1,890	1,877	13
Russia	11	..	11
Java	51	40	11
Norway	12	3	9
Orange River Colony ..	10	3	7
Madras	9	2	7
Chili	9	4	5
Greece	3	..	3

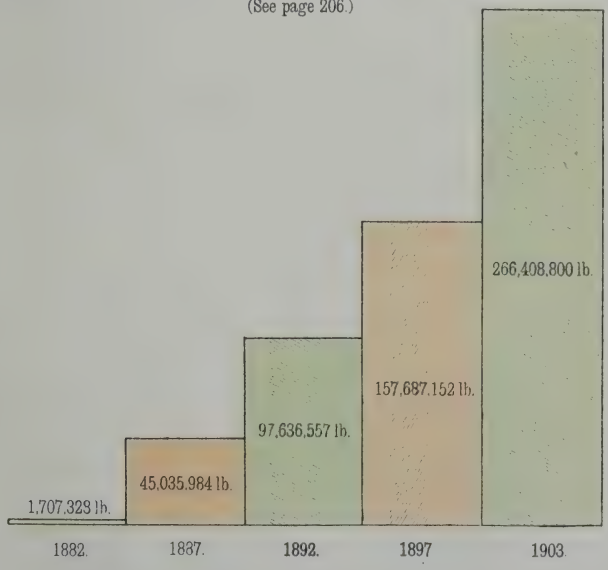
Country, Colony, State, &c.	1903. £	1902. £	Decrease. £
Natal	336,321	674,708	338,387
Victoria	1,068,751	1,295,233	226,482
New South Wales	974,460	1,118,193	143,733
Western Australia	100,759	132,907	32,148
Queensland	37,289	62,988	25,699
Tasmania	23,498	40,996	17,498
Hongkong	57,577	66,354	8,777
South Australia	29,239	34,033	4,794
British Columbia	202	4,348	4,146
Brazil	1,030	4,909	3,879
Norfolk Island	1,447	3,549	2,102
Philippine Islands	288	2,193	1,905

WOOL PRODUCED, 1888, 1892, 1897, and 1903.



FROZEN MEAT EXPORTED, 1882, 1887, 1892, 1897, and 1903.

(See page 206.)



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Country, Colony, State, &c.	1903. £	1902. £	Decrease. £
Japan	2,070	3,780	1,710
Friendly Islands	35,272	36,980	1,708
Canada	2,219	3,018	799
Navigator Islands	29,752	30,537	785
Caroline Islands	..	458	458
Society Islands	22,977	23,393	416
Sandwich Islands	1,527	1,713	186
Marshall Islands	..	140	140
Canary Islands	..	44	44
Guam	..	22	22
Italy	11	32	21
Surprise Island	4	22	18
Rhodesia	10	13	3
Peru	..	2	2
Burmah	..	1	1

Wool exported and produced.

The quantity of wool exported in 1903, as previously shown, was 155,128,381 lb., valued at £4,041,274, a decrease of 5,290,642 lb., or 3·30 per cent. on the quantity exported in the previous year, but an increase of £686,711, or 20·47 per cent. on the value. The annual production of wool is best estimated by taking the exports for the twelve months immediately preceding the commencement of shearing, and adding thereto the quantity used in the colony for manufacturing purposes.

The following shows the produce for each of the last sixteen years ending on the 30th September :—

Year ending 30th September.	Quantity exported.	Quantity purchased by Local Mills.	Total Annual Produce.
	Lb.	Lb.	Lb.
1888	89,276,268	4,079,563	93,355,831
1889	95,618,507	3,556,004	99,174,511
1890	102,522,185	2,979,293	105,501,478
1891	108,619,473	2,918,073	111,537,546
1892	110,860,050	3,388,954	114,249,004
1893	119,643,874	2,629,855	122,273,729
1894	128,480,457	2,476,155	130,956,612
1895	129,333,769	3,299,132	132,632,901
1896	128,309,673	3,989,934	132,299,607
1897	134,410,955	3,298,469	137,709,424
1898	150,401,399	3,763,831	154,165,230
1899	143,644,203	4,258,505	147,902,708
1900	144,829,515	3,223,392	148,052,907
1901	143,064,789	4,629,924	147,694,713
1902	155,652,563	4,203,312	159,855,875
1903	160,919,693	5,294,652	166,214,345

From these figures it appears that, notwithstanding the apparent decrease from 1898 to 1901, the wool-clip has increased by over 78 per cent. during the last sixteen years.

To arrive at a perfectly correct estimate of the increase in wool-production it would be necessary to take into consideration the proportion of greasy, scoured (and sliped), and washed wool exported each year, the washing process of course greatly reducing the weight. The percentages of greasy, scoured, and washed wool to the total quantities exported during the last six years are :—

Years.	Greasy. Per Cent.	Scoured and Sliped. Per Cent.	Washed. Per Cent.
1898	78·62	20·36	1·02
1899	77·54	21·64	0·82
1900	78·62	20·10	1·28
1901	78·25	20·61	1·14
1902	73·82	24·26	1·92
1903	76·47	22·15	1·38

Although the increase in the wool-production is, of course, mainly due to the greater number of sheep—namely, 18,954,553 in April, 1903, against 15,423,328 in May, 1889—it becomes necessary to note that there is a diminution since 1902 to the number of 1,388,174. In fact, the number of sheep has receded in one year to little more than the number for 1892, chiefly in consequence of killing for export. A comparative statement for several years is supplied, showing the number of flocks in groups of sizes :—

Number of Flocks, 1890 to 1903.

Size of Flocks.	1890.	1892.	1894.	1896.	1898.	1900.	1903.
Under 500	7,662	8,822	10,314	12,028	12,836	12;239	12,428
500 and under 1,000..	1,528	2,033	2,427	2,605	2,708	2,810	2,923
1,000 „ 2,000..	854	1,193	1,409	1,460	2,412*	2,621†	2,751‡
2,000 „ 5,000..	586	761	933	892			
5,000 „ 10,000..	283	314	345	340	341	352	342
10,000 „ 20,000..	236	231	230	231	231	196	207
20,000 and upwards ..	160	176	179	147	144	139	110
Totals ..	11,309	13,530	15,837	17,703	18,722	18,357	18,761

* From 1,000 to 2,500, 1,798 flocks; from 2,500 to 5,000, 614 flocks.
† From 1,000 to 2,500, 1,971 flocks; from 2,500 to 5,000, 650 flocks.
‡ From 1,000 to 2,500, 2,081 flocks; from 2,500 to 5,000, 670 flocks.

It will be apparent that the general tendency of increase since the year 1890 is towards the multiplication of the smaller flocks, whose owners are better able to cope with the rabbit difficulty than the large runholders.

Export of Rabbit-skins.

Prior to 1878 rabbit-skins were a very small item in the exports, but in that year the number sent out of the colony amounted to 3,951,209. Ten years after (1888) the export had risen to 11,809,407, from which it increased to 17,041,106 in 1893, the greatest number as yet exported in a year. From 1895 the fall was rapid, and the export for 1898 only reached 6,607,934 skins. In 1899 there was a slight upward tendency, the number exported being 7,891,648,

which, however, fell to 5,690,893 in the year 1900. In 1901 7,122,008 skins were exported, in 1902 6,139,794 skins, and in 1903 only 6,101,899 skins.

The figures for the years in which there has been decline are quoted :—

Year.	Number of Rabbit-skins exported.	Year.	Number of Rabbit-skins exported.
1893 ..	17,041,106	1899 ..	7,891,648
1894 ..	14,267,385	1900 ..	5,690,893
1895 ..	15,229,314	1901 ..	7,112,008
1896 ..	10,828,612	1902 ..	6,139,794
1897 ..	8,099,334	1903 ..	6,101,899
1898 ..	6,607,934		

From the above it will be seen that the importance of the export has very much diminished. The fall, represented in money value, has been :—

Year.	Value of Rabbit-skins exported. £	Year.	Value of Rabbit-skins exported. £
1893 ..	138,952	1899 ..	81,118
1894 ..	87,993	1900 ..	41,689
1895 ..	85,022	1901 ..	57,046
1896 ..	65,599	1902 ..	52,566
1897 ..	47,472	1903 ..	40,727
1898 ..	51,607		

While the amount of money received for this produce of the colony shows less profit than formerly, it may be a satisfactory result, as seemingly indicating some abatement of the rabbit-pest. Large quantities of frozen rabbits are now exported, and are alluded to in the remarks on the frozen-meat industry on the next page.

Export of Sheepskins and Pelts.

These form a more important article of export at the present time than the rabbit-skins, though in the year 1888 the position was the reverse as regards value in money. In 1888 the number of sheepskins and pelts sent away from New Zealand was 1,646,401, against 7,142,531 in 1903, a rise of 334 per cent. for the period between those years. The value increased from £83,574 to £468,969, or 461 per cent. Figures for the last ten years are quoted :—

Year.	Export of Sheepskins and Pelts. No.	Year.	Export of Sheepskins and Pelts. No
1894 ..	2,681,552	1899 ..	4,960,054
1895 ..	3,230,539	1900 ..	4,669,430
1896 ..	3,001,791	1901 ..	4,601,531
1897 ..	3,688,051	1902 ..	6,144,680
1898 ..	4,995,325	1903 ..	7,142,531

Export of Tallow.

Besides wool and meat, tallow is largely exported, and since the year 1888, when 136,460 cwt. were sent away, the export has increased to 396,940 cwt. in 1903. In value this export considerably exceeds that of either sheepskins or rabbit-skins, and the money is

indeed more than the total for those two articles taken together. The ten atest years show the following results :—

TALLOW EXPORTED.

Years.	Cwt.	£	Years.	Cwt.	£
1894	199,400	204,499	1899	338,620	311,649
1895	263,560	260,999	1900	367,780	368,473
1896	222,540	208,821	1901	335,360	351,710
1897	310,200	259,964	1902	424,060	550,131
1898	347,160	302,141	1903	396,940	517,871

The decrease in 1903 synchronizes with that of the number of sheep in the colony.

Frozen Meat exported.

Frozen meat now takes second place among the exports of New Zealand produce. In 1903, 2,378,650 cwt., valued at £3,197,043, were shipped in the colony. An account of the development of the industry was given in a special article in the Year-book, 1894. The total export for each year since the commencement of the trade has been :—

Year.	Lb.	Year.	Lb.
1882	1,707,328	1893	100,262,453
1883	9,853,200	1894	114,827,216
1884	28,445,228	1895	127,018,864
1885	33,204,976	1896	123,576,544
1886	38,758,160	1897	157,687,152
1887	45,035,984	1898	173,798,576
1888	61,857,376	1899	208,972,624
1889	73,564,064	1900	206,621,072
1890	100,934,756	1901	208,045,264
1891	110,199,082	1902	239,519,384
1892	97,636,557	1903	266,408,800

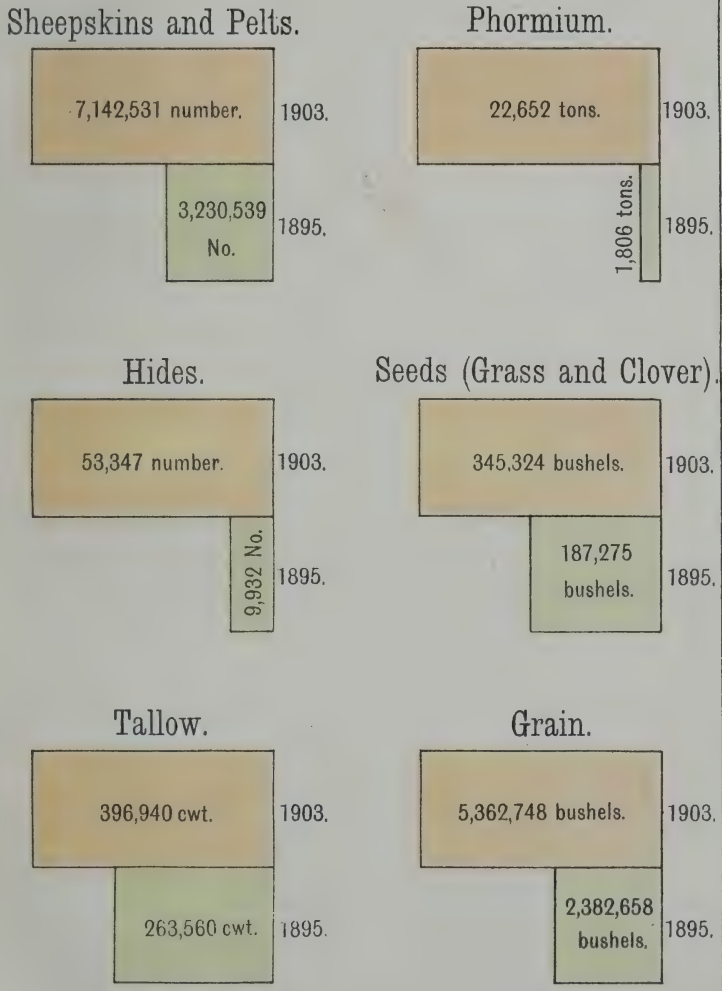
The above figures for 1899 include 129,224 cwt., or 4,876,534 (number) of frozen rabbits and hares in the skin ; those for 1900 include 12,260 (731 cwt.) of hares, and 6,501,997 rabbits, weighing 167,971 cwt., valued at £154,856 ; those for 1901, include 42,202 (2,943 cwt.) of hares, and 4.830,669 (124,353 cwt.) of rabbits, valued at £117,813 ; those for 1902 include 23,421 (1,643 cwt.) of hares, and 4,776,914 (123,229 cwt.) rabbits, valued at £118,884 ; and those for 1903 include 8,145 (588 cwt.) of hares, and 4,452,829 (112,972 cwt.) rabbits, valued at £100,088 : so that rabbits can hardly now be looked upon as wholly worthless, especially when the export of the skins, previously remarked upon, is further considered.

To ascertain the total value of the meat export in 1903 it is necessary to take into consideration, with the amount of £3,197,043, value of frozen meat before stated, £11,804 for frozen fish ; also the value of preserved meats, £96,217 ; of salted beef and pork, £11,188 ; and of bacon and hams, £14,678.

Gold exported.

The amount of gold exported in 1903 was 533,314 oz., an increase of 25,462 oz. on the quantity exported in 1902.

RISE IN THE EXPORT OF CERTAIN PRINCIPAL ARTICLES, THE PRODUCE OF THE COLONY,
1895-1903
(See also following diagram.)



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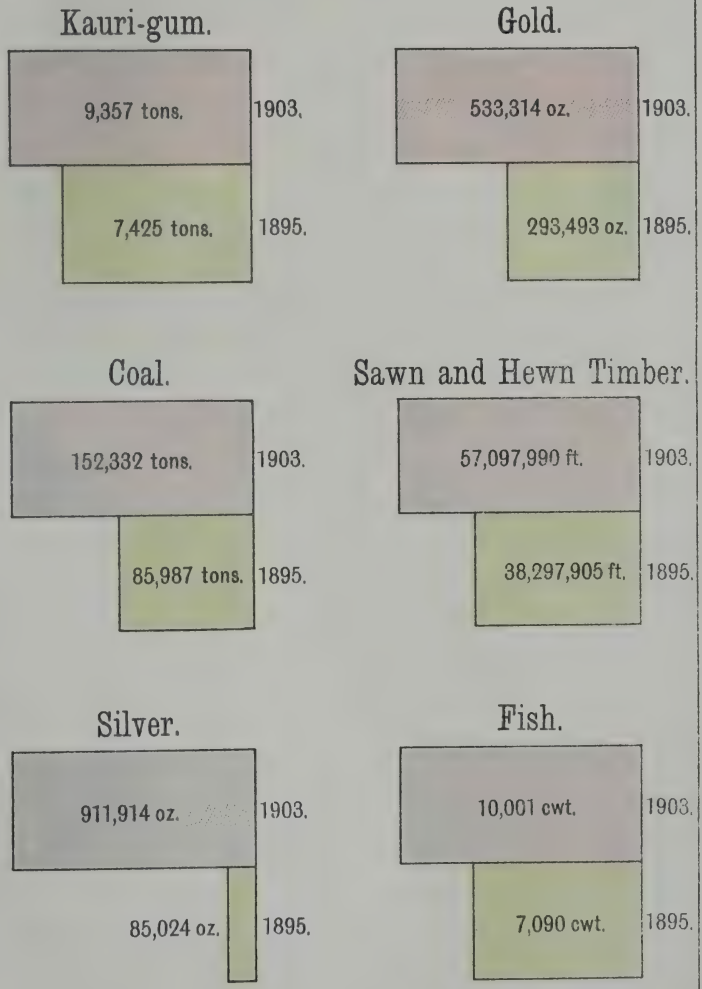
RISE IN THE EXPORT OF CERTAIN PRINCIPAL ARTICLES, THE PRODUCE OF THE COLONY,

1895-1903—continued.



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The total quantity of gold entered for duty to the 31st December, 1903, which may be reckoned as approximately the amount obtained in the colony, was 16,105,821 oz., of the value of £63,149,147. For fuller information, see special section on mining.

Grain exported.

The value of the grain exported in 1903 was £533,865. The grain exports for 1902 and 1903 were made up as under :—

	1902.		1903.	
	Bushels.	£	Bushels.	£
Wheat	194,671	31,074	71,700	14,068
Oats	5,185,812	666,664	4,956,330	453,702
Barley	151,360	25,062	154,137	26,917
Malt	2,865	705	1,020	269
Maize	225,829	40,417	18,058	3,656
Peas and beans	102,314	22,097	160,403	35,066
Rye and unenumerated ..	2,711	529	1,100	187
Total quantity and value	5,865,562	£786,548	5,362,748	£533,865

Compared with the previous year the quantity and value of grain exported in 1903 show a considerable decrease.

From the year 1890 to 1898, inclusive, the decline in the export of wheat was very great, while for 1899, 1900, and 1901 there was a revival, as will be seen by the following figures. But for 1902 and 1903 the quantity sent out of the colony fell to 194,671 bushels and 71,700 bushels respectively :—

Year.	Wheat exported. Bushels.	Year.	Wheat exported. Bushels.
1890	4,467,026	1899	2,901,676
1892	2,460,774	1900	2,867,069
1894	228,904	1901	2,301,092
1896	453,123	1902	194,671
1898	10,090	1903	71,700

The imports of wheat during 1898 exceeded the exports by upwards of 50,000 bushels, but from 1899 to 1903 the imports were practically nil, the small quantity introduced into the colony being for seeding purposes only.

In oats, the quantity exported in 1903 shows a decrease over that for the previous year :—

Year.	Export of Oats. Bushels.	Year.	Export of Oats. Bushels.
1891	4,052,414	1899	3,520,734
1892	3,830,444	1900	5,818,648
1894	1,963,288	1901	10,514,924
1896	2,247,053	1902	5,185,812
1898	816,210	1903	4,956,330

The acreages under cereals for the last four years have been :—

	1900-1901. Acres.	1901-1902. Acres.	1902-1903. Acres.	1903-1904. Acres.
Land in wheat (for threshing) ..	206,465	163,462	194,355	230,346
" oats " ..	449,534	405,924	483,659	409,390
" barley " ..	30,831	26,514	27,921	34,681

Butter and Cheese exported.

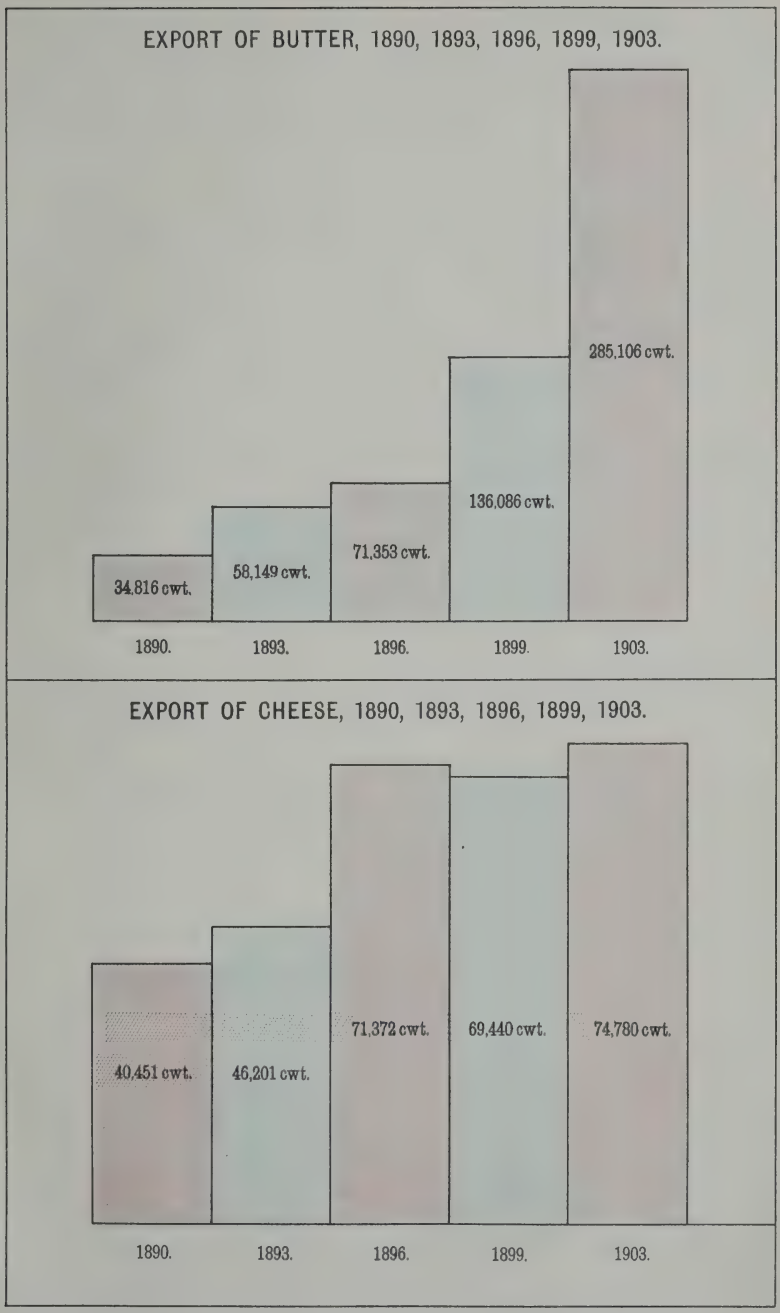
The total quantity of butter and cheese exported in the past fifteen years, and the amount of either commodity sent to the United Kingdom is tabulated:—

Year.	Total Export of Butter.	Butter Exported to the United Kingdom.	Total Export of Cheese.	Cheese Exported to the United Kingdom.
	Cwt.	Cwt.	Cwt.	Cwt.
1889	37,955	21,099	26,558	7,633
1890	34,816	26,579	40,451	31,043
1891	39,430	28,989	39,770	29,565
1892	53,930	41,509	41,493	30,000
1893	58,149	52,363	46,201	41,567
1894	60,771	58,845	55,655	54,540
1895	57,964	55,194	76,743	73,369
1896	71,353	60,092	71,372	58,692
1897	99,002	79,849	77,683	67,681
1898	96,801	80,814	68,711	41,412
1899	136,086	121,502	69,440	40,901
1900	172,583	165,871	102,849	81,908
1901	201,591	170,903	104,294	74,510
1902	253,998	170,207	74,746	50,325
1903	285,106	249,016	74,780	64,661

Of the butter exported in 1903, 249,016 cwt., valued at £1,145,226, were shipped to the United Kingdom; 3,121 cwt., value £14,769, to New South Wales; 10,229 cwt., value £48,318, to Victoria; 468 cwt., value £2,259, to Tasmania; 3,729 cwt., value £18,237, to Western Australia; 46 cwt., value £214, to South Australia; 512 cwt., value £2,501, to Queensland; 793 cwt., value £3,919, to Fiji; 16,323 cwt., value £77,915, to Cape Colony and Natal; 810 cwt., value £4,418, to the South Sea Islands; 56 cwt., value £277, to Philippine Islands; 2 cwt., value £11, to Ceylon; and 1 cwt., valued at £3, to Norfolk Island.

Of the cheese exported, 64,661 cwt., valued at £167,667, were sent to the United Kingdom; 1,109 cwt., value £3,090, to New South Wales; 2,253 cwt., value £5,980, to Victoria; 4,921 cwt., value £13,196, to Western Australia; and 884 cwt., value £2,410, to the

DIAGRAM No. 6.



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other Australian States. While the quantity of butter exported in 1903, 285,106 cwt., shows an increase of 651 per cent. on the quantity exported in 1889, the increase in the export of cheese during the fifteen years has been at the rate of 182 per cent.—74,780 cwt. in 1903, as against 26,558 cwt. in 1889.

Phormium fibre exported.

Phormium fibre, of which 22,652 tons (excluding 2,042 tons of tow), valued at £595,684, were exported in 1903, shows an increase in the export, on comparing the figures for last year with those for 1902, when the quantity sent away was 20,852 tons. Outside of the question of prices, a large permanent development of this industry depends on the cultivation and careful selection of the plants used, and on improvements in the method of preparing the fibre.

Kauri-gum exported.

The export for 1903 (9,357 tons) is a substantial one. The value was £631,102, or an average of £67 8s. 11d. per ton. Full information as to the uses of this resin and the kauri-gum industry generally was given in a special article in Part III. of the Year-book for 1900. It embraces interesting matter from the report of the Royal Commission which investigated the whole subject in 1898.

Exports from different Ports, &c.

The following table gives the values of the exports from each port in New Zealand for the last two years, arranged in order of magnitude for 1903:—

	1903. £	1902. £
Wellington	2,737,762	2,567,268
Lyttelton	2,670,513	2,382,429
Auckland	2,501,605	2,091,016
Dunedin	1,441,085	1,618,294
Napier	892,238	838,910
Timaru	886,985	685,759
Invercargill and Bluff	814,654	938,599
Poverty Bay	541,077	397,039
Greymouth	417,802	411,115
Wanganui	416,983	307,345
New Plymouth	398,737	413,911
Oamaru	292,648	154,252
Patea	264,059	249,750
Wairau and Picton	219,129	143,094
Kaipara	153,593	131,789
Nelson	105,014	70,080
Westport	93,202	97,206
Waitara	88,173	88,247
Hokitika	54,275	42,561

The decrease of exports during 1903 was £177,209 at Dunedin, £123,945 at Invercargill and Bluff, £15,174 at New Plymouth, £4,004 at Westport, and £74 at Waitara.

Details of all Exports, 1903.

Articles exported.		Quantities.		Value in Sterling.		
		Produce and Manufactures of the Colony.	British, Foreign, and other Colonial Produce and Manufactures.	Produce and Manufactures of the Colony.	British, Foreign, and other Colonial Produce and Manufactures.	Total.
Acid—				£	£	£
Unenumerated	lb.	..	2,260	..	59	59
Alkali—						
Soda crystals	cwt.	6	..	2	..	2
Potash	"	..	10	..	16	16
Animals, living—						
Birds	No.	13	..	15	..	15
Dogs	"	14	..	54	..	54
Goats	"	3	..	2	..	2
Cattle (horned)	"	366	..	4,337	..	4,337
Horses	"	320	8	10,357	305	10,662
Pigs	"	266	..	416	..	416
Poultry	"	7,620	8	954	17	971
Sheep	"	21,763	..	22,941	..	22,941
Apparel and slops	..	..	..	2,520	3,499	6,019
Arms, ammunition, and explosives—						
Caps, percussion	No.	..	250,000	..	29	29
Cartridges	"	21,300	28,000	130	122	252
Detonators	..	..	..	..	16	16
Dynamite	lb.	..	2,575	..	169	169
Firearms	No.	..	46	..	241	241
Fuse	coils	..	240	..	9	9
Ordnance stores	..	..	..	12	285	297
Powder, sporting	lb.	..	1,500	..	136	136
Unenumerated	..	..	..	..	115	115
Bacon and hams—						
Bacon	cwt.	761	..	2,993	..	2,993
Hams	"	3,010	..	11,685	..	11,685
Bags and sacks—						
Cornsacks	doz.	2,863	5,638	223	1,306	1,529
Unenumerated	"	264	10,571	38	1,148	1,186
Basketware and wickerware	..	..	..	7	..	7
Bêche-de-mer	cwt.	16	..	26	..	26
Beer	galls.	20,146	3,246	2,105	749	2,854
Belting, other than leather	lb.	..	..	..	33	33
Beverages, non-alcoholic	doz.	1,201	69	228	16	244
Limejuice, sweetened	galls.	..	20	..	4	4
Limejuice, unsweetened	"	1,222	8,279	82	577	659
Bicycles and tricycles	No.	6	86	45	725	770
Materials for	..	..	..	..	1,484	1,484
Biscuits—						
Fancy, and other kinds	lb.	15,527	..	337	..	337
Ships' plain	cwt.	5,544	..	4,956	..	4,956
Blacking	..	..	..	5	128	133
Boats	No.	4	..	600	..	600
Bones	tons	4	..	15	..	15
Books, printed	..	..	..	4,860	2,549	7,409

DETAILS OF ALL EXPORTS, 1903—*continued.*

Articles exported.	Quantities.		Value in Sterling.		
	Produce and Manufactures of the Colony.	British, Foreign, and other Colonial Produce and Manufactures.	Produce and Manufactures of the Colony.	British, Foreign, and other Colonial Produce and Manufactures.	Total.
			£	£	£
Boots and shoes .. doz. prs.	77	279	325	960	1,285
Bran .. .. tons	5,503	..	22,434	..	22,434
Brass—					
Tube .. .. cwt.	1	..	2	..	2
Pigs, bars, &c. .. "	..	9	..	30	30
Manufactures	..	..	24	80	104
Bricks .. .. No.	23,100	..	66	..	66
Bricks, Fire .. .. "	4,150	..	40	..	40
Brushware and brooms ..	..	..	4	32	36
Butter .. .. cwt.	285,106	..	1,318,067	..	1,318,067
Candles .. .. lb.	90	9,146	3	136	139
Canvas	..	..	4	16	20
Cards, playing .. packs	..	91	..	4	4
Carpeting and druggeting ..	..	..	..	524	524
Carriages, &c.—					
Carriages .. .. No.	25	6	524	67	591
Carts and wagons .. "	15	3	163	40	203
Perambulators .. "	3	..	9	..	9
Materials for	..	..	2	73	75
Casks, empty .. .. No.	83	726	34	449	483
Cement .. .. barrels	41	116	21	79	100
Chaff .. .. tons	768	..	2,806	..	2,806
Chains .. .. cwt.	2	..	15	4	19
Cheese .. .. "	74,780	..	194,998	..	194,998
Chinaware	..	..	..	196	196
Coals .. .. tons	152,332	3,804	128,927	3,804	132,731
Cocoa and Chocolate .. lb.	..	1,726	..	99	99
Coffee—					
Raw .. .. "	..	13,804	..	339	339
Roasted .. .. "	..	643	..	31	31
Confectionery—					
Chocolate in fancy packages ..	..	..	..	97	97
Unenumerated .. lb.	10,466	..	267	..	267
Copper—					
Pig, bar, &c. .. cwt.	..	8	..	32	32
Copperware	..	..	..	13	13
Copra .. .. tons	20	94	213	1,416	1,629
Cordage .. .. cwt.	757	339	1,684	547	2,231
Iron and steel .. "	..	30	..	58	58
Cork, cut	..	..	..	50	50
Cottons—					
Calico	..	..	..	790	790
Cheese-cloth	..	..	..	38	38
Shirtings	..	..	..	110	110
Waterproof material ..	..	..	..	13	13
Tubular-woven cotton-cloth ..	..	..	..	450	450
Unenumerated	..	..	..	2,774	2,774
Cotton-waste .. .. cwt.	..	11	..	16	16

DETAILS OF ALL EXPORTS, 1903—*continued.*

Articles exported.		Quantities.		Value in Sterling.		
		Produce and Manufactures of the Colony.	British, Foreign, and other Colonial Produce and Manufactures.	Produce and Manufactures of the Colony.	British, Foreign, and other Colonial Produce and Manufactures.	Total.
				£	£	£
Cutlery		..	..	..	394	394
Doors	No.	568	..	508	..	508
Drapery		..	..	256	1,988	2,244
Tailors' trimmings		..	..	..	58	58
Lace and laces		..	..	..	20	20
Drugs—						
Chemicals n.o.e.		..	..	431	12	443
Baking-powder		..	..	3	20	23
Cream of tartar	lb.	..	3,998	..	162	162
Insecticides		..	..	6	..	6
Food-preservative		..	..	..	7	7
Gums		..	..	..	7	7
Drugs, and druggists' sundries		..	..	314	1,177	1,491
Anhydrous ammonia		..	..	19	..	19
Disinfectants		..	..	9	2	11
Potassium cyanide	cwt.	..	20	..	100	100
Sheep-dip		..	..	363	69	432
Washing-powder		..	..	..	89	89
Dyes		..	..	..	211	211
Earthenware		..	..	99	451	550
Eggs	doz.	4,715	..	271	..	271
Engine-packing	cwt.	..	11	..	169	169
Essential oils	lb.	..	170	..	50	50
Fancy-goods and toys		..	..	501	2,691	3,192
Curiosities		..	..	421	250	671
Feathers	lb.	5,430	..	119	..	119
Felt-sheathing		..	..	..	113	113
Fire-hose and other appliances		..	..	..	100	100
Fire-clay	tons	15	..	39	..	39
Fish—						
Dried	cwt.	243	65	606	136	742
Potted and preserved	lb.	160,769	58,080	4,037	1,436	5,473
Frozen	cwt.	8,323	..	11,804	..	11,804
Ova	No.	407,000	..	439	..	439
Fishing-tackle		..	..	..	31	31
Floorcloth and oilcloth		..	..	..	76	76
Flour	tons	249	16	2,736	173	2,909
Foods, animal, n.o.e.		..	..	213	..	213
Foods, farinaceous—						
Arrowroot	lb.	..	2,352	..	23	23
Sago and tapioca	cwt.	..	47	..	23	23
Maizena and cornflour	lb.	..	11,800	..	199	199
Fruits—						
Bottled and preserved	doz.	48	204	10	56	66

DETAILS OF ALL EXPORTS, 1903—*continued.*

Articles exported.		Quantities.		Value in Sterling.		
		Produce and Manufactures of the Colony.	British, Foreign, and other Colonial Produce and Manufactures.	Produce and Manufactures of the Colony.	British, Foreign, and other Colonial Produce and Manufactures.	Total.
Fruits, dried—				£	£	£
Currants	lb.	..	11,177	..	147	147
Raisins	"	..	10,414	..	208	208
Unenumerated ..	"	31	11,239	1	273	274
Fruits, fresh ..	"	74,500	21,400	736	186	922
Fruit—						
Pulp and partially preserved	lb.	520,549	..	6,322	..	6,322
Preserved in sulphurous acid	"	576	..	7	..	7
Fungus	cwt.	4,280	..	9,290	..	9,290
Furniture and upholstery ..		..	..	1,034	455	1,489
Furniture and other polish ..		..	..	41	51	92
Furs		..	..	..	31	31
Gelatine and isinglass	lb.	540	1,687	41	78	119
Glass bottles		..	..	7	182	189
Glassware		..	..	..	554	554
Glue and size	cwt.	235	27	149	6	155
Glycerine	"	459	42	772	65	837
Gold	oz.	533,314	60	2,037,832	243	2,038,075
Grain and pulse—						
Barley	bush.	154,137	..	26,917	..	26,917
Beans and peas ..	"	160,403	..	35,066	..	35,066
Maize	"	18,058	..	3,656	..	3,656
Oats	"	4,956,330	..	453,702	..	453,702
Rye	"	1,100	..	187	..	187
Wheat	"	71,700	8	14,068	2	14,070
Ground	centals	10	..	5	..	5
Grease	cwt.	..	16	..	18	18
Gum, kauri	tons	9,357	..	631,102	..	631,102
Haberdashery		..	..	..	535	535
Buttons		..	..	45	..	45
Sewing-cottons		..	..	..	576	576
Hair	cwt.	547	..	2,923	..	2,923
Hardware, hollow-ware, and ironmongery		..	..	497	2,342	2,839
Hats and caps ..	doz.	16	260	46	260	306
Hatters' materials		..	..	..	349	349
Hay and straw ..	tons	1,531	..	3,406	..	3,406
Hides	No.	53,347	..	55,216	..	55,216
Honey	lb.	60,760	..	1,036	..	1,036
Hops	cwt.	3,873	7	21,826	73	21,899
Horns and hoofs ..	tons	65	..	1,062	..	1,062
Hosiery		..	..	797	422	1,219
Indiarubber goods		..	..	..	603	603
Ink, printing	lb.	54	110	6	14	20

DETAILS OF ALL EXPORTS, 1903—*continued.*

Articles exported.		Quantities.		Value in Sterling.		
		Produce and Manufactures of the Colony.	British, Foreign, and other Colonial Produce and Manufactures.	Produce and Manufactures of the Colony.	British, Foreign, and other Colonial Produce and Manufactures.	Total.
Instruments, musical—				£	£	£
Harmoniums, &c.	No.	..	5	..	59	59
Pianofortes	"	..	29	..	1,059	1,059
Unenumerated	..	..	..	2	393	395
Instruments—						
Optical	..	..	..	15	22	37
Scientific	..	..	..	..	220	220
Surgical and dental	..	..	..	20	307	327
Surveying	..	..	..	..	88	88
Iron and steel—						
Angle	tons	..	8	..	70	70
Bar, bolt, and rod	"	2	22	20	303	323
Bolts and nuts	cwt.	..	3	1	4	5
Castings for ships	tons	..	5	7	75	82
Galvanised manufactures	..	..	..	353	403	756
Hoop	ton	..	1	..	16	16
Pig	"	..	2	..	7	7
Pipes and fittings	cwt.	12	20	10	26	36
Rails	tons	..	4	..	29	29
Sheet and plate	"	2	5	25	67	92
Sheet, galvanised, corrugated	cwt.	..	2,723	..	2,298	2,298
Sheet, galvanised, plain	"	..	113	..	127	127
Staples and standards	..	..	..	1	..	1
Tanks, 400 galls.	No.	..	62	..	196	196
Tanks, 200 galls.	"	..	3	..	6	6
Wire, fencing, barbed	tons	..	20	..	293	293
Wire, telegraphic and telephonic	tons	..	2	..	10	10
Wire netting	..	..	..	..	176	176
Wire, n.o.e.	cwt.	..	10	..	12	12
Unenumerated	tons	1	2	41	10	51
Jams, jellies, and preserves	lb.	12,788	4,530	246	75	321
Jellies, concentrated	"	..	1,646	..	51	51
Jewellery	..	..	..	326	17	343
Lamps, lanterns, and lampwick		..	..	5	260	265
Lard	cwt.	116	..	313	..	313
Lead, pigs and bars	"	..	2	..	20	20
Leather	"	15,465	14	94,024	268	94,292
Leather manufactures, unenumerated	..	..	..	23	62	85
Lime	bush.	2,480	..	92	..	92
Linen piece-goods	..	..	..	..	238	238
Linseed	centals	12,839	..	6,209	..	6,209
Machinery—						
Agricultural	..	..	..	5,072	6,602	11,674
Dairying	..	..	..	42	1,576	1,618

DETAILS OF ALL EXPORTS, 1903—*continued.*

Articles exported.	Quantities.		Value in Sterling.		
	Produce and Manufactures of the Colony.	British, Foreign, and other Colonial Produce and Manufactures.	Produce and Manufactures of the Colony.	British, Foreign, and other Colonial Produce and Manufactures.	Total.
Machinery—*continued.*			£	£	£
Dredging	..	..	1,971	7,267	9,238
Electric	..	..	4	1,014	1,018
Engines, steam .. No.	2	4	260	307	567
„ boilers for .. „	..	1	..	220	220
„ gas and oil „	..	4	..	330	330
Flour-milling	..	..	..	399	399
Gas-making	..	..	..	349	349
Mining	..	..	724	1,589	2,313
Printing	..	..	104	225	329
Refrigerating	..	..	..	1,598	1,598
Sewing and knitting No.	..	145	..	603	603
Wood-working	..	..	..	85	85
Woollen-milling	..	..	..	18	18
Unenumerated	..	..	983	3,347	4,330
Materials for, and parts of ..	..	..	38	126	164
Malt.. .. .. bush.	1,020	..	269	..	269
Manures—					
Bonedust .. .. tons	4	..	30	..	30
Guano .. .. „	..	20	..	50	50
Unenumerated .. „	375	..	1,778	1	1,779
Matches and vestas, wooden gross boxes	..	3,625	..	307	307
Mats and matting	..	..	76	71	147
Meal, oaten .. .. centals	27,828	22	13,273	11	13,284
Meats—					
Beef, frozen .. cwt.	205,205	..	272,105	..	272,105
„ salted .. „	7,405	..	10,741	..	10,741
Kidneys, frozen .. „	8,831	..	13,436	..	13,436
Lamb, frozen .. carcases	2,212,805	..	1,125,523	..	1,125,523
=cwt.	702,234				
Mutton (whole carcases), frozen .. carcases	2,602,612	..	1,594,135	..	1,594,135
=cwt.	1,279,835				
Mutton (joints), frozen cwt.	57,431	..	69,170	..	69,170
Pork, frozen .. „	3,140	..	8,979	..	8,979
„ salted .. „	167	..	447	..	447
Poultry, frozen .. pairs	19,289	..	4,257	..	4,257
Veal, frozen .. cwt.	1,092	..	1,511	..	1,511
Other kinds, frozen .. „	7,322	..	12,096	..	12,096
Rabbits, frozen in the skins No.	4,452,829	..	99,595	..	99,595
=cwt.	112,972				
Hares, frozen in the skins No.	8,145	..	493	..	493
=cwt.	588				
Potted and preserved „	39,525	67	96,217	165	96,382
Extract .. .. lb.	25,435	..	3,454	..	3,454
Unenumerated .. cwt.	386	..	844	..	844
Medicines, patent	..	..	536	373	909
Metal manufactures	..	..	2,003	4,398	6,401

DETAILS OF ALL EXPORTS, 1903—*continued.*

Articles exported.		Quantities.		Value in Sterling.		
		Produce and Manufactures of the Colony.	British, Foreign, and other Colonial Produce and Manufactures.	Produce and Manufactures of the Colony.	British, Foreign, and other Colonial Produce and Manufactures.	Total.
Metal manufactures—*continued.*				£	£	£
Anchors	No.	..	15	..	23	23
Rivets and washers	cwt.	..	32	..	20	20
Typewriters	No.	..	13	..	194	194
Weighbridges and weighing-machines	..	..	..	100	23	123
Metal, old	cwt.	15,572	6	3,811	19	3,830
Milk, preserved	lb.	636,942	48,708	12,588	1,044	13,632
Millinery	..	..	..	85	312	397
Feathers, ornamental	..	..	..	40	..	40
Minerals—						
Auriferous ore	tons	472	..	4,449	..	4,449
Copper ore	"	6	..	123	..	123
Hæmatite	..	..	..	1	..	1
Lead ore	tons	21	..	170	..	170
Manganese	"	70	..	210	..	210
Scheelite ore	"	42	..	1,439	..	1,439
Tin-ore	"	2	..	180	..	180
Unenumerated	"	88	..	776	..	776
Nails	cwt.	..	481	..	336	336
Nuts—						
Almonds in shell	lb.	..	240	..	8	8
" shelled	"	..	620	..	18	18
Candlenuts	"	12,320	..	49	..	49
Cocoanuts	No.	..	6,440	..	24	24
Unenumerated	lb.	54	..	1	..	1
Oakum	cwt.	..	5	..	8	8
Oil—						
Castor, bulk	galls.	..	186	..	22	22
Colza	"	..	950	..	130	130
Cocoanut	"	3,282	..	392	..	392
Fish, penguin, and seal	"	90	292	16	30	46
Linseed	"	..	2,877	..	464	464
Mineral, kerosene	"	..	127,998	..	5,440	5,440
" other kinds	"	90	5,738	2	433	435
Neatsfoot	"	952	..	40	..	40
Olive, bulk	"	..	500	..	96	96
Whale	"	15,320	..	1,163	..	1,163
Unenumerated (bulk)	"	481	4,109	68	382	450
" bottled, doz. pts.		..	16	..	7	7
Oilmen's stores	..	..	..	..	10	1,951	1,961
Onions	cwt.	4,851	..	1,708	..	1,708
Oysters	doz.	294,690	..	2,445	..	2,445
Paints and colours—						
Ground in oil	cwt.	..	646	..	920	920
Mixed ready for use	"	10	280	20	1,171	1,191
Unenumerated	"	292	49	101	56	157

DETAILS OF ALL EXPORTS, 1903—*continued.*

Articles exported.		Quantities.		Value in Sterling.		
		Produce and Manufactures of the Colony.	British, Foreign, and other Colonial Produce and Manufactures.	Produce and Manufactures of the Colony.	British, Foreign, and other Colonial Produce and Manufactures.	Total.
Paper—				£	£	£
Bags	"	778	..	665	..	665
Butter, paper ..	"	..	6	..	8	8
Printing " ..	"	103	41	132	76	208
Wrapping " ..	"	877	46	542	84	626
Writing " ..	"	..	16	..	40	40
Unenumerated ..	"	5	1	28	1	29
Peel, candied and dried	lb.	224	..	4	..	4
Perfumery	galls.	..	70	..	102	102
Unenumerated ..	"	..	..	..	43	43
Phormium fibre ..	tons	22,652	..	595,684	..	595,684
Tow	"	2,042	..	7,727	..	7,727
Photographic goods ..	..	..	..	24	545	569
Pictures	..	..	..	1,235	938	2,173
Picture-frames and mounts	..	..	..	4	75	79
Pitch	cwt.	907	..	183	..	183
Plants and shrubs ..	..	..	..	779	..	779
Plaster of paris ..	cwt.	..	1	..	1	1
Plate and platedware ..	..	..	..	293	1,458	1,751
Pollard and sharps ..	tons	723	..	4,514	..	4,514
Potatoes	"	3,170	..	13,028	..	13,028
Printing materials ..	..	..	..	48	70	118
Provisions	..	..	..	1,838	591	2,429
Pumps	..	..	..	172	68	240
Putty	cwt.	..	31	..	18	18
Rags	"	1,022	..	735	..	735
Railway plant ..	..	..	..	..	35	35
Rice	cwt.	..	933	..	740	740
Rugs	..	..	..	2,732	131	2,863
Saddlery	..	..	..	776	75	851
Sashes	pairs	1,009	..	759	..	759
Sauces	galls.	89	134	53	84	137
Sausage-skins ..	cwt.	14,521	122	65,385	727	66,112
Seeds—						
Grass and clover ..	"	61,665	124	109,049	339	109,388
Unenumerated ..	..	..	..	1,792	390	2,182
Shells, pearl	cwt.	..	2	..	20	20
Ship-chandlery ..	..	..	..	281	378	659
Silk piece-goods ..	..	..	..	..	887	887
Silver	oz.	911,914	..	91,497	..	91,497
Skins—						
Calf and other kinds	No.	8,569	..	1,266	..	1,266
Rabbit	"	6,101,899	..	40,727	..	40,727
	=lb.	801,735				
Sheep, with wool ..	No.	683,251	..	107,028	..	107,028
	=lb.	4,998,068				
Sheep, without wool..	No.	6,459,280	..	361,941	..	361,941
	=lb.	15,074,406				
Pelt pieces	lb.	138,544	..	127	..	127

DETAILS OF ALL EXPORTS, 1903—*continued.*

Articles exported.		Quantities.		Value in Sterling.		
		Produce and Manufactures of the Colony.	British, Foreign, and other Colonial Produce and Manufactures.	Produce and Manufactures of the Colony.	British, Foreign, and other Colonial Produce and Manufactures.	Total.
Soap—				£	£	£
Common	cwt.	8,042	..	7,231	..	7,231
Powder	..	..	..	..	26	26
Unenumerated	..	..	..	31	172	203
Specie—						
Gold	..	..	..	..	36,375	36,375
Silver	..	..	..	..	2,072	2,072
Copper	..	..	..	..	5	5
Specimens, illustrative of natural science	..	..	..	396	20	416
Spices, unground	lb.	..	1,622	..	162	162
Spirits—						
Bitters, cordials, &c.	galls.	..	20	..	19	19
Brandy	"	..	551	..	368	368
Gin and geneva	"	..	1,107	..	353	353
Rum	"	..	254	..	78	78
Whisky	"	..	8,650	..	3,397	3,397
Stationery	..	..	..	1,873	809	2,682
Educational apparatus	..	..	..	..	47	47
Stearine	cwt.	48	..	72	..	72
Stone—						
Building	tons	28	..	22	..	22
Wrought	..	..	..	80	..	80
Unwrought	cwt.	55	..	96	..	96
Pumice	tons	628	..	1,717	..	1,717
Greenstone	cwt.	160	..	733	..	733
Grind, mill, oil, and whet	..	..	..	5	12	17
Sugar—						
Refined	lb.	725,679	80,502	6,054	588	6,642
Molasses and treacle	cwt.	12	..	12	..	12
Tallow	tons	18,407	..	465,817	..	465,817
Oleomargarine	"	1,440	..	52,054	..	52,054
Tanning materials—						
Bark, crude	tons	171	..	1,101	..	1,101
Other kinds	..	..	..	..	10	10
Tar	..	..	..	..	6	6
Tea	lb.	..	92,787	..	4,351	4,351
Textile piece-goods	..	..	..	4	312	316
Textiles, made-up	..	..	..	15	5	20
Timber—						
Logs	No.	311	..	1,245	..	1,245
" hewn	sup. ft.	486,348	..	1,477	..	1,477
Sawn, undressed	"	55,063,747	..	226,169	..	226,169
" dressed	"	1,547,895	..	13,067	..	13,067
Unenumerated	..	..	..	1,806	..	1,806
Tin—						
Sheet	cwt.	..	79	..	70	70
Tinware	..	..	..	119	236	355

DETAILS OF ALL EXPORTS, 1903—*continued.*

Articles exported		Quantities.		Value in Sterling.		
		Produce and Manufactures of the Colony.	British, Foreign, and other Colonial Produce and Manufactures.	Produce and Manufactures of the Colony.	British, Foreign, and other Colonial Produce and Manufactures.	Total
Tobacco—				£	£	£
Manufactured ..	lb.	..	53,039	..	4,651	4,651
Cigars	"	50	2,198	25	865	890
Cigarettes	"	..	3,367	..	1,198	1,198
Tobacco-pipes, &c.		..	..	..	29	29
Tools—						
Engineers' machine ..		..	..	..	10	10
Sheep-shears		..	..	..	10	10
Unenumerated		..	..	105	446	551
Turpentine	gals.	..	1,776	..	279	279
Twine	cwt.	..	3	..	92	92
Reaper and binder ..	"	18,006	..	32,422	..	32,422
Umbrellas and parasols ..		..	..	..	257	257
Materials for		..	..	..	40	40
Varnish and gold size ..	gals.	31	588	17	220	237
Vegetables		..	..	300	6	306
Vinegar	gals.	33	835	3	86	89
Watches	No.	..	2,012	..	2,397	2,397
Wax—						
Paraffin	lb.	..	420	..	9	9
Unenumerated ..	"	..	106	..	8	8
Whalebone	cwt.	37	..	715	..	715
Wine—						
Australian	gals.	..	527	..	221	221
Sparkling	"	..	403	..	722	722
Other kinds ..	"	54	744	26	483	509
Woodenware		..	..	1,139	326	1,465
Mouldings		..	..	..	105	105
Wool—						
Greasy	lb.	118,632,131	70,073	2,879,277	2,949	2,882,226
Scoured	"	14,746,107	..	543,341	..	543,341
Sliped	"	19,617,211	..	565,797	..	565,797
Washed	"	2,132,932	..	52,859	..	52,859
Woolpacks	doz.	..	2	..	2	2
Woollen piece-goods ..		..	..	2,027	1,631	3,658
" blankets ..	pairs	187	..	216	..	216
Yarns		..	..	40	..	40
Zinc—						
Spelter	cwt.	723	397	542	310	852
Goods, miscellaneous—						
Manufactured ..		..	..	705	732	1,437
Unmanufactured ..		..	..	2,086	186	2,272
Parcels Post		..	..	20,844	..	20,844

A table is appended giving details of goods forwarded in the year 1903 to the Cook and other Pacific Islands annexed to New Zealand in 1901. These do not appear as exports from the colony, being merely part of the internal trade or transactions between one portion of what is now New Zealand and another.

Articles.	Quantities.	Value.
		£
Animals, living	..	284
Apparel and slops n.o.e.	..	802
Bags and sacks	1,230 doz.	369
Biscuits	..	1,601
Boots and shoes	108 doz. pairs	352
Butter	74 cwt.	355
Casks, empty	553 No.	218
Cement	437 barrels	200
Coal	1,123 tons	1,171
Cordage	93 cwt.	212
Cotton piece-goods	..	2,345
Drapery	..	2,477
Fish, preserved	..	558
Flour	95 tons	1,041
Furniture and upholstery	..	233
Hardware, holloware, and ironmongery	..	496
Hosiery	..	296
Iron and steel	..	465
Meats, salted and preserved	1,031 cwt.	2,409
Oils	8,563 gals.	464
Oilmen's stores	..	539
Provisions, unenumerated	..	326
Rice	573 cwt.	398
Rugs	..	215
Ship-chandlery	..	205
Soap, common	891 cwt.	631
Spirits	1,037 gals.	388
Sugar, refined	927 cwt.	907
Timber	..	3,948
Tobacco	..	374
Miscellaneous	..	3,686
Total value of goods shipped to the Islands ..		£27,965

Of the above, goods to the value of £27,846 were forwarded from Auckland, £92 from Lyttelton, £20 from Wellington, and £7 from Dunedin.

Particulars of goods cleared outwards from these annexed islands in 1903 will be found in Section IV., p. 167.

Total Value of Trade.

The value of the total trade of New Zealand advanced from £13,431,804 in the year 1886 to £27,799,053 in 1903. But of these amounts some portion was coin. Excluding the specie, the figures for 1886 are £12,853,736, and for 1903, £27,047,885.

Year.	Total Trade.	Imports.	Exports.	Imports (excluding Specie).	Exports (excluding Specie).	Excess of Exports over Imports (excluding Specie).
	£	£	£	£	£	£
1886	13,431,804	6,759,013	6,672,791	6,319,223	6,534,513	215,290
1887	13,111,684	6,245,515	6,866,169	6,064,281	6,680,772	616,491
1888	13,709,225	5,941,900	7,767,325	5,430,050	7,403,206	1,972,156
1889	15,650,727	6,308,863	9,341,864	5,980,583	9,183,954	3,203,371
1890	16,072,245	6,260,525	9,811,720	5,928,895	9,569,316	3,640,421
1891	16,070,246	6,503,849	9,566,397	6,431,101	9,560,859	3,129,758
1892	16,477,907	6,943,056	9,534,851	6,742,544	9,490,920	2,748,376
1893	15,896,879	6,911,515	8,985,364	6,494,279	8,680,845	2,186,566
1894	16,019,067	6,788,020	9,231,047	5,990,177	9,221,550	3,231,373
1895	14,950,353	6,400,129	8,550,224	6,115,953	8,518,119	2,402,166
1896	16,458,425	7,137,320	9,321,105	7,035,379	9,299,907	2,264,528
1897	18,072,216	8,055,223	10,016,993	7,994,201	9,741,222	1,747,021
1898	18,748,555	8,230,600	10,517,955	8,211,409	10,449,838	2,238,429
1899	20,677,968	8,739,633	11,938,335	8,613,656	11,923,422	3,309,766
1900	23,892,257	10,646,096	13,246,161	10,207,326	13,223,258	3,015,932
1901	24,699,339	11,817,915	12,881,424	11,353,416	12,869,810	1,516,394
1902	24,971,700	11,326,723	13,644,977	10,958,038	13,635,459	2,677,421
1903	27,799,053	12,788,675	15,010,378	12,075,959	14,971,926	2,895,967

The trade for these years has been selected for exhibition in tabular form because during each of the series there was an excess of exports over imports, whereas previously the reverse obtained, and the colony was purchasing to an extent not covered by the value of the export. During the last eighteen years the excess of exports over imports, excluding money sent to and from the colony, amounted to a total sum of £43,011,426.

How different the foregoing conditions were from those previously obtaining will be seen by observing the balance of trade for the years 1881 to 1885 inclusive :—

Year.	Excess of Imports over Exports. £	Year.	Excess of Imports. over Exports. £
1881	1,406,898	1884	235,981
1882	1,948,485	1885	539,239
1883	761,938		

The gradually declining excess of imports turned in 1886 and 1887 to a small excess of exports, but subsequently the excess of exports was very great, and attained the sum of £3,640,421 in the year 1890.

Again considering the results for the eighteen years, 1886–1903, during which the balance was in favour of the exports, the external trade is shown for each year per head of population, the calculations being made exclusive as well as inclusive of specie, for the purpose of arriving at exact conclusions as regard trade in goods. In the year 1894 the imported money amounted to a sum of £797,843, and in 1903 to £712,716, making a substantial difference in the rates.

Excluding specie, the trade per head of population increased from £22 1s. 7d., in 1886, to £32 19s. 6d. in 1903 : imports from £10 17s. 1d. to £14 14s. 5d., and exports from £11 4s. 6d. to £18 5s. 1d.

Year.	Including Specie.			Excluding Specie.		
	Total Trade per Head of Mean Population (excluding Maoris).	Imports per Head of Mean Population (excluding Maoris).	Exports per Head of Mean Population (excluding Maoris).	Total Trade per Head of Mean Population (excluding Maoris).	Imports per Head of Mean Population (excluding Maoris).	Exports per Head of Mean Population (excluding Maoris).
	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.
1886	23 1 5	11 12 2	11 9 3	22 1 7	10 17 1	11 4 6
1887	21 19 8	10 9 5	11 10 3	21 7 5	10 3 4	11 4 1
1888	22 12 11	9 16 4	12 16 7	21 4 0	8 19 5	12 4 7
1889	25 9 11	10 5 6	15 4 5	24 15 9	9 15 6	15 0 3
1890	25 13 10	10 0 2	15 13 8	24 19 4	9 11 0	15 8 4
1891	25 10 4	10 6 6	15 3 10	25 7 10	10 4 3	15 3 7
1892	25 13 2	10 16 3	14 16 11	25 5 6	10 9 11	14 15 7
1893	24 0 9	10 9 0	13 11 9	22 18 11	9 16 5	13 2 6
1894	23 11 9	9 19 11	13 11 10	22 7 11	8 16 5	13 11 6
1895	21 11 10	9 4 10	12 7 0	21 2 8	8 16 8	12 6 0
1896	23 5 8	10 1 11	13 3 9	23 2 2	9 19 1	13 3 1
1897	25 0 11	11 3 3	13 17 8	24 11 7	11 1 7	13 10 0
1898	25 9 3	11 3 7	14 5 8	25 6 11	11 3 1	14 3 10
1899	27 11 5	11 13 1	15 18 4	27 7 8	11 9 8	15 18 0
1900	31 5 9	13 18 10	17 6 11	30 13 8	13 7 4	17 6 4
1901	31 15 0	15 3 10	16 11 2	31 2 9	14 11 11	16 10 10
1902	31 6 0	14 3 11	17 2 1	30 16 6	13 14 8	17 1 10
1903	33 17 10	15 11 10	18 6 0	32 19 6	14 14 5	18 5 1

The highest record of trade (excluding specie) was that for 1874, when the rate per head was £41 4s. 5d., the imports, in consequence of the large expenditure of borrowed money, amounting at that time to £24 17s. per head, against £14 14s. 5d. in 1903.

It has been customary to leave out the Maoris in estimating the sum per head, for their industries and necessities swell the volume of trade in comparatively so slight a measure that the amount per head of European population can be more truly ascertained by omitting them altogether.

Trade with different Countries, States, or Colonies.

The trade with the United Kingdom in 1903 amounted to £18,857,743, comprising 67·84 per cent. of the total.

With the Australian States, trade was done during 1903 to the value of £4,388,962; of which New South Wales claimed £2,203,587, and Victoria £1,884,754, made up as follows:—

Exports from New Zealand.	£
To New South Wales, 1903	974,460
„ Victoria, 1903	1,068,751

Imports into New Zealand.	£
From New South Wales, 1903	1,229,127
„ Victoria, 1903	816,003

The latter amounts, in each case, represent the declared values of the imports into New Zealand from the States mentioned, not their export value as given in the New South Wales and Victorian returns.

Included in the exports to New Zealand from New South Wales is coal to the quantity of 163,903 tons, valued at £158,128.

Both imports from and exports to the United States in 1903 show an increase when compared with the previous year's figures. Details of articles imported will be found on page 193.

The articles of exported New Zealand products for 1903 were:—

Exports to United States of America.	£
Gum (kauri), value	362,890
Phormium fibre „	125,425
Sheepskins „	88,038
Sausage-skins „	37,499
Wool „	22,330
Grass-seed „	12,434
Binder twine „	11,911
Coal „	1,867
Rabbit-skins „	859
Hides „	795

The following table shows the value of the total trade with the United States for each of the past ten years, 1894 to 1903 inclusive, during which period the trade has increased considerably. But the increase is mostly on the side of the imports from those States, and especially from the Atlantic ports, from which there is a far greater output to New Zealand than from the Pacific side.

TRADE WITH THE UNITED STATES.

Year.	Imports from		Exports to		Total Trade.
	Atlantic Ports.	Pacific Ports.	Atlantic Ports.	Pacific Ports.	
	£	£	£	£	£
1894	359,196	35,495	230,829	56,367	681,887
1895	351,823	42,410	298,536	18,103	710,872
1896	419,689	73,151	263,564	63,025	819,429
1897	521,939	106,105	252,013	123,083	1,003,140
1898	700,555	99,856	337,059	286,074	1,423,544
1899	687,906	87,403	387,614	45,885	1,208,808
1900	958,286	103,587	424,314	34,482	1,520,669
1901	1,174,745	240,515	332,175	186,904	1,934,339
1902	1,146,575	172,362	447,623	42,341	1,808,901
1903	1,239,535	201,823	563,885	105,764	2,111,007

The development in the decennial period is at the rate of over 200 per cent., or an increase in value of £1,429,120.

Figures showing ten years' trade with Germany exhibit advancing imports reaching for the year 1903 to the substantial sum of £274,297. Details of articles imported from Germany will be found on page 194.

TRADE WITH GERMANY.

Year.	Imports from	Exports to	Total Trade.
	£	£	£
1894	68,163	6,374	74,537
1895	78,034	2,481	80,515
1896	101,381	5,190	106,571
1897	157,066	5,468	162,534
1898	153,102	17,244	170,346
1899	160,605	28,027	188,632
1900	182,074	24,186	206,260
1901	198,521	10,470	208,991
1902	210,560	9,389	219,949
1903	274,297	17,584	291,881

The principal articles of New Zealand produce exported to Germany in the year 1903 were :—

	£
Gum (kauri)	14,670
Coals	1,385
Rabbit-skins	530
Scheelite-ore	304
Greenstone	147

The trade with India and Ceylon reached a total of £400,103, against £416,348 in 1902. The imports—tea, rice, castor-oil, wool-packs, &c.—were reckoned at £395,070, leaving a balance of only £5,033 for exports.

The value of the South African trade from 1893 to 1903 is as follows:—

Year.	Imports from	Exports to	Total Trade.
	£	£	£
1893	1,563	3,779	5,342
1894	16	2,545	2,561
1895	58	10,255	10,313
1896	129	12,508	12,637
1897	87	6,795	6,882
1898	72	2,766	2,838
1899	215	90,187	90,402
1900	502	405,419	405,921
1901	386	825,476	825,862
1902	997	754,059	755,056
1903	299	455,187	455,486

Trade of Australasia.

The following table gives the value of the imports and exports of what is now the Commonwealth of Australia and the Colony of New Zealand for the year 1902:—

State or Colony.	Total Value of		Excess of Exports over Imports.	Excess of Imports over Exports.
	Imports.	Exports.		
	£	£	£	£
Queensland	7,352,538	9,171,023	1,818,485	..
New South Wales ..	25,974,210	23,544,051	..	2,430,159
Victoria	18,270,245	18,210,523	..	59,722
South Australia	6,073,782	7,698,514	1,624,732	..
Ditto, Northern Territory	107,217	191,558	84,341	..
Western Australia ..	7,218,352	9,051,358	1,833,006	..
Tasmania	2,442,745	3,244,508	801,763	..
New Zealand	11,326,723	13,644,977	2,318,254	..

In the preceding table is given the total trade inwards and outwards of each State and colony, counting twice over the value of goods produced in one State or colony and carried thence into

another, and reckoning the same goods three times where they are imported from without into one State or colony and re-exported thence in the same year into another. But, in order to form a just idea of the trade of Australasia as a whole, it is necessary to eliminate the inter-state traffic altogether. From the following table the value of imports and exports exchanged between the various States has accordingly been excluded :—

External Trade of Australasia.

Year.	Total Trade.	Imports.	Exports.	Excess of Imports.	Excess of Exports.
	£	£	£	£	£
1885 ..	72,220,444	41,136,038	31,084,406	10,051,632	..
1890 ..	75,143,818	38,451,160	36,692,658	1,758,502	..
1891 ..	84,565,778	41,325,033	43,240,745	..	1,915,712
1892 ..	75,325,933	34,529,501	40,796,432	..	6,266,931
1893 ..	67,788,738	27,925,990	39,862,748	..	11,936,758
1894 ..	65,192,202	26,063,630	39,128,572	..	13,064,942
1895 ..	67,624,317	27,425,725	40,198,592	..	12,772,867
1896 ..	74,511,262	34,420,596	40,090,666	..	5,670,070
1897 ..	83,569,568	37,862,741	45,706,827	..	7,844,086
1898 ..	85,600,442	37,310,583	48,289,859	..	10,979,276
1899 ..	97,637,194	39,990,123	57,647,071	..	17,656,948
1900 ..	104,298,717	48,351,933	55,946,784	..	7,594,851
1901 ..	109,651,267	50,506,802	59,144,465	..	8,637,663
1902 ..	101,019,347	47,539,709	53,479,638	..	5,939,929

It will be observed that in the year 1885 the excess of imports over exports for Australasia amounted to no less a sum than £10,051,632, and that five years later the excess of imports had fallen to £1,758,502. In 1891 the position was completely reversed, the exports exceeding the imports by £1,915,712. This excess increased to £6,266,931 in the following year (1892), and to £13,064,942 in 1894, but decreased to £12,772,867 in 1895, to £5,670,070 in 1896. It was £7,844,086 in 1897, £10,979,276 in 1898, and in 1899 the excess of exports over imports amounted to £17,656,948. In 1900 there was a falling-off in the value of exports, and the excess amounted to only £7,594,851, but in 1901 the balance in favour of exports was £8,637,663. Both imports and exports declined during 1902, and the excess of exports over imports was only £5,939,929.

The trade per head of the population in each of the States of the Australian Commonwealth and New Zealand in 1902 was :—

TRADE PER HEAD OF THE POPULATION IN 1902.

State or Colony.	Mean Population.	Imports.	Exports.	Total Trade.
		£ s. d.	£ s. d.	£ s. d.
Queensland	513,612	14 6 4	17 17 1	32 3 5
New South Wales	1,392,575	18 13 0	16 18 2	35 11 2
Victoria	1,207,110	15 2 8	15 1 9	30 4 5
South Australia	359,232	16 18 2	21 8 7	38 6 9
Ditto, Northern Territory ..	4,510	23 15 5	42 9 6	66 4 11
Western Australia	207,142	34 16 11	43 13 11	78 10 10
Tasmania	175,655	13 18 2	18 9 5	32 7 7
New Zealand	797,793	14 3 11	17 2 1	31 6 0

But the values of the exports of the Australian States, more especially New South Wales, Victoria, and South Australia, are largely increased by the inclusion of articles the produce or manufacture of other States, colonies, and countries.

The value of home productions or manufactures exported from each State or colony in 1902, and the rate per head of mean population, were as follow:—

State or Colony.	Home Produce exported. £	Per Head of Population. £ s. d.
Queensland	8,732,058 ..	17 0 0
New South Wales	17,248,494 ..	12 7 9
Victoria	14,554,922 ..	12 1 2
South Australia	4,768,947 ..	13 5 6
Ditto, Northern Territory ..	190,717 ..	42 5 9
Western Australia	8,871,676 ..	42 16 7
Tasmania	3,227,777 ..	18 7 6
New Zealand	13,498,599 ..	16 18 5

The next table sets forth the amount of the trade of each of the above-named States and colony with the United Kingdom in 1902:—

State or Colony.	Imports from the United Kingdom.	Exports to the United Kingdom.	Total Trade with the United Kingdom.
	£	£	£
Queensland	2,496,851	2,736,632	5,233,483
New South Wales	8,572,370	7,102,596	15,674,966
Victoria	6,935,040	3,433,310	10,368,350
South Australia	1,901,996	1,911,116	3,813,112
Ditto, Northern Territory	5,911	21,753	27,664
Western Australia	3,350,644	4,364,910	7,715,554
Tasmania	585,750	654,174	1,239,924
New Zealand	6,851,452	9,450,648	16,302,100

The statement appended shows the relative importance of Australasia as a market for the productions of the United Kingdom:—

EXPORTS OF HOME PRODUCTIONS FROM THE UNITED KINGDOM, IN 1902, TO—

	£
British India and Ceylon	34,128,361
Australasia	25,207,694
Cape of Good Hope and Natal	24,436,739
United States	23,760,913
Germany	22,850,295
France	15,587,300
Dominion of Canada	10,345,256
Russia	8,635,393
Holland	8,445,915
Belgium	8,409,659
Italy	7,409,984
Sweden and Norway	7,194,525
China	7,142,021
Egypt	6,161,627
Turkey	6,113,740
Argentine Republic	5,871,096
Brazil	5,389,956
Japan	5,065,526
Spain	4,785,214
Denmark, Iceland, and Greenland	3,702,022
Chili	2,829,254
Straits Settlements	2,744,555
West India Islands and Guiana	2,628,315
Java, &c.	2,417,563
Mexico	2,170,945
Hongkong	2,136,202

The exports to other countries did not amount to £2,000,000 in any one case.

Australasia as a whole, with a population of about 4,700,000, thus takes the second place in importance for consumption of British produce, the exports thereto being nearly three-fourths the value of similar exports to British India, with its 294,000,000 inhabitants.

SECTION VI.—MANUFACTORIES AND WORKS.

The results of the compilation of the special returns relating to the various manufactories, works, &c., in the colony are compared with those shown for previous censuses in certain of the tabulated statements given with these remarks.

It must be observed, however, that whereas up till the time of last census the term "factory" was rather held to mean an establishment where manufacture was carried on wholesale, where machinery was employed, and where several hands worked together; in the returns for 1901 a "factory" has been interpreted to mean any concern where two or more persons work together at making articles for disposal, wholesale or retail, and without reference to machinery being used or not. Thus the return seems to be rather one showing industrial workers (and their production) where two or more are found together, than one of manufactories to supply the wholesale traders, or making for export. But the attempt has been made to approximate the census results to those of the Labour Department, according to special direction. To make the comparison with previous census figures as true as possible, the results for all the dressmaking, tailoring, shirt-making, millinery, and other establishments which were not included until 1901, have been deducted from the totals at foot of the summary table. Any roughness in the comparison caused by small concerns employing two persons only, and doing a retail business in making or repairing, having been included at the last census, but not before, cannot be avoided. And indeed it will become clear to any one reading the following remarks that the large increase in money value of manufactures is obtained mostly on items in respect of which moving down to a limit of two persons engaged would not materially alter the comparison.

The totals for the industries do not include mining and quarrying, which are dealt with separately.

Deducting, as above mentioned, from the total value of manufactures for the year 1900 the results for such industries as were not included in 1895, a most satisfactory increase is found on analysis of items, which has been mainly brought about by developments on a large scale in the following industries:—

VALUE OF OUTPUT FOR YEAR 1895 COMPARED WITH 1900.

	Increase in 5 years. £
Meat freezing, preserving, &c.	2,182,616
Butter and cheese factories	1,033,876
Tanning, fellmongering, and wool-scouring ...	650,855
Foundries, boiler-making, range-making, and engineering	621,356
Sawmills, with sash and door making ...	369,882
Printing establishments (not Government) ...	315,161
Clothing (with boot and shoe) factories ...	242,122
Breweries and malt-houses	240,468
Flaxmills	170,946
Gasworks	91,542
Chaff-cutting works	90,816
Biscuit factories	79,010
Bacon-curing establishments	73,542
Coach-building and painting	67,108
Woollen-mills	56,959
Brick, tile, and pottery works	56,090
Aerated-water factories	53,202
Cycle factories	46,230
Lime and cement works	29,261

If to these be added the value of the grass-seed after dressing, £241,239 for the year 1900, the greater part of the increase in the total for all manufactured articles (£7,591,789) is accounted for. There are a large number of smaller amounts of increase than those above stated, but the main lines of development are sufficiently indicated.

The addition of the figures in the column for total value of manufactures is not absolutely justified to the fullest extent of the amount shown (seventeen million pounds sterling); but in the present state of New Zealand industries it appears that the degree of repetition of value is not so great as to prevent the total given being of great help in judging of development. No doubt seventeen million pounds is over the fact, because, for instance, butter frozen for export is included in returns for meat freezing establishments, and also in the butter factory returns; timber cut is valued under saw-milling, and some again in the furniture-making line. Also, leather is valued in the tanning returns, and some part of it again in the boot and saddlery items. But, of the material operated upon, a great deal is imported.

The great primary industries of meat-freezing, butter and cheese making, with some others, do not mainly provide materials for making other wares.

The iron which is used at the foundries and engineering works is imported to New Zealand.

But it must be admitted that, as the colony advances in primary industries, deductions will have to be made with great discrimination from the figures in the column "Value of all manufactures," in respect of the amounts given in the returns.

As yet it is held that the addition is not so much affected by repetitions as to render the result other than useful; although, as before remarked, the total figures are admittedly in excess of the actual fact. The comparison with previous census results is still considered valuable.

Special tables in the Census Volume, following the summaries, show clearly that quantities rose as well as the value of manufactures, so that the development is not merely a question of market prices but of actual output.

In 1896 the actual increase in five years of the annual output was found to be only £775,523. But it was noticed that there were special causes for this amount being so small; and also that quantities showed then in many cases a certain degree of development of industries, though values had not been maintained throughout.

The year 1895 was admittedly a time when great results could not be looked for. Severe financial troubles had happened shortly before. The phormium and rope industries, iron-working (implements and other) were not thriving, and in other lines matters were not altogether what could have been wished. The inquiry for the year 1900 has been made after a period of great prosperity.

MANUFACTORIES AND WORKS, 1896 AND 1901.

	April, 1896. No.	March, 1901.† No.	Increase, 1896-1901. No.
Number of establishments* ..	2,459	3,163	704
Hands employed—			
Males	22,986	35,438	12,452
Females	4,403	6,288	1,885
Totals†	27,389	41,726	14,337
Wages paid—	£	£	£
To Males	1,776,076	2,895,279	1,119,203
Females	131,516	203,282	71,766
Totals†	1,907,592	3,098,561	1,190,969

* Omitting Government Railway Workshops and Government Printing Office.
† Excluding dressmaking, tailoring, shirt-making, millinery, &c., for which no returns in 1896.

MANUFACTORIES AND WORKS, 1896 AND 1901—*continued.*

	April, 1896.	March, 1901.	Increase 1896–1901.
	H.-p.	H.-p.	H.-p.
Horse-power	28,096	39,052	10,956
	£	£	£
Total approximate value of—			
Land	1,063,989	1,713,254	649,265
Buildings	1,743,073	2,419,803	676,730
Machinery and plant	2,988,955	3,826,574	837,619
Totals	5,796,017	7,959,631	2,163,614

Under the heading "Hands employed," the males increased from 22,986 in 1896 to 35,438, or at the rate of nearly 54·17 per cent. in five years. The females employed increased at the rate of 42·81 per cent.

The wages paid in the factories or large industrial works dealt with in the census returns were returned for 1895 at £1,907,592, and for 1900 £3,098,561.

The average annual amount of wages paid to male hands was £77·2 in 1895 and £81·7 in 1900. For females, £29·8 in 1895 against £32·3 at the last census. The wages of both would seem to have been more than maintained.

The increase for the year 1901 over 1896 in the horse-power stated in the returns was 10,956, against 6,400 for 1896.

The approximate value of the land used for purposes of the factories and industries increased from £1,063,989 in 1896 to £1,713,254 in 1901. The value of the lands used for mining is not included in the above figures, and the value of Crown lands has been omitted throughout.

A very satisfactory development will be found in the value of the machinery and plant, from £2,988,955 in 1896 to £3,826,574 in 1901, being at the rate of 28·02 per cent. for the period. The value of the buildings also increased greatly.

INDUSTRIES IN PROVINCIAL DISTRICTS.

All the various industries for which returns were received in 1901 are given in the statement below, which thus enumerates completely the manufactories and works in operation in the colony, specifying the provincial districts in which they are situated:—

INDUSTRIES IN PROVINCIAL DISTRICTS.

Manufactories, Works, &c.	Number of Industries in Provincial Districts.									Total Number of Industries.
	Auckland.	Taranaki.	Hawke's Bay.	Wellington.	Marlborough.	Nelson.	Westland.	Canterbury.	Otago.	
Animal food—										
Meat freezing and preserving works	7	2	2	5	1	..	..	4	13	34
Ham- and bacon-curing establishments	4	4	2	3	..	4	..	10	12	39
Fish curing and preserving works	8	..	..	4	1	1	1	..	13	28
Butter and cheese factories	27	102	8	37	4	7	3	17	42	247
Rabbit-packing	..	..	..	..	..	..	..	..	7	7
Condensed milk factory	..	..	..	..	..	..	..	..	1	1
Vegetable food—										
Grain-mills	8	3	2	8	2	5	..	23	27	78
Biscuit-factories	5	..	1	3	1	1	..	2	7	20
Fruit-preserving and jam-making works	6	1	1	1	..	1	..	1	2	13
Sugar-boiling and confectionery works	8	..	3	4	..	..	..	7	4	26
Sugar-refining works	1	..	..	..	..	..	..	..	..	1
Fruit-canning works	1	..	..	..	..	..	..	..	..	1
Baking-powder factories	8	..	..	1	..	..	..	1	1	11
Drinks, narcotics, and stimulants—										
Breweries	9	3	5	10	2	10	4	16	15	74
Malthouses	4	..	1	3	2	4	1	10	8	33
Colonial-wine making	4	..	3	1	1	2	1	2	..	14
Aerated-water factories	22	11	8	24	5	7	4	27	17	125
Coffee and spice works	4	..	..	4	..	1	1	3	5	18
Tobacco manufactories	2	..	..	..	..	..	..	..	..	2
Cigarette manufactories	1	..	..	1	..	..	..	..	1	3
Sauce and pickle factories	9	1	1	5	..	1	..	4	2	23
Vinegar works	3	..	..	..	..	1	..	..	..	4
Ice factories	2	..	..	..	..	..	..	..	..	2
Animal matters (not otherwise classed)—										
Bone-mills	2	3	..	2	..	..	1	..	..	8
Soap and candle works	7	..	1	4	..	2	..	6	4	24
Glue factory	1	..	..	..	..	..	..	..	..	1
Sausage skin factory	1	..	1	3	..	..	..	4	1	10
Boiling-down works	5	..	1	3	..	..	..	..	5	14
Manure-works	1	..	2	..	..	..	..	1	1	5
Oleomargarine-works	..	..	..	..	..	..	..	1	..	1
Fat-refining works	..	..	..	..	..	..	..	1	..	1
Working in wood—										
Cooperages	4	2	2	4	..	..	..	7	4	23
Saw-mills, sash and door factories	48	23	26	66	8	46	29	18	70	334
Barrow and ladder factory	1	..	..	..	..	..	..	..	..	1
Woodware and turnery factories	10	1	..	5	..	..	..	6	6	28

INDUSTRIES IN PROVINCIAL DISTRICTS—*continued.*

Manufactories, Works, &c.	Number of Industries in Provincial Districts.									Total Number of Industries.
	Auckland.	Taranaki.	Hawke's Bay.	Wellington.	Marlborough.	Nelson.	Westland.	Canterbury.	Otago.	
Vegetable produce for fodder—										
Chaff-cutting establishments	15	2	..	..	..	12	..	25	1	55
Grass-seed-dressing establishments	..	4	1	..	..	..	..	9	11	25
Paper-manufacture—										
Paper-mills	1	..	..	..	..	..	..	..	2	3
Paper bag and box factories	3	..	..	..	..	..	..	1	3	7
Gas-works	6	2	2	6	1	2	2	4	5	30
Electric-lighting works	..	1	..	1	..	1	..	1	2	6
Processes relating to stone, clay, glass, &c.—										
Lime and cement works	6	..	..	1	..	2	1	..	5	15
Brick, tile, and pottery works	24	5	8	18	1	5	2	20	25	108
Tobacco-pipe factory	..	..	..	..	..	..	..	..	1	1
Monumental masonry	8	..	1	3	..	2	..	6	7	27
Glassworks	1	..	..	..	..	..	..	1	..	2
Glass-bevelling works	1	..	..	1	..	..	..	..	..	2
Electro-plating works	1	..	..	..	..	..	..	1	..	2
Pumice-works	1	..	..	..	..	..	..	..	..	1
Metals, other than gold and silver—										
Tinware-factories	12	..	..	13	..	4	2	18	11	60
Iron and brass foundries, boiler-making, machinists, &c.	13	1	2	13	2	3	3	14	14	65
Heel- and toe-plate factories	2	..	..	..	..	..	..	..	1	3
Engineering-works	10	..	..	9	..	2	..	8	8	37
Range-making works	5	..	..	1	..	..	..	..	3	9
Spouting and ridging factories	6	8	2	3	..	..	..	7	9	35
Lead-headed-nail works	..	..	..	1	..	..	..	..	..	1
Iron-pipe and fluming works	..	..	..	..	..	..	..	..	2	2
Books and publications—										
Printing offices	35	12	4	40	2	8	3	35	49	188
Musical instruments—										
Musical-instrument factories	..	..	..	1	..	..	..	..	2	3
Ornaments, minor art products, and small wares—										
Picture-frame makers	2	..	..	4	..	..	..	..	3	9
Basket and perambulator factories	6	..	..	6	..	..	..	4	5	21
Cork-cutting	1	..	..	..	..	..	..	..	..	1
Lapidaries	..	..	..	..	..	..	..	..	3	3
Equipment for sports and games—										
Billiard-table factories	1	..	..	1	..	..	..	1	..	3
Designs, medals, type, and dies—										
Rubber-stamp making	2	..	..	..	..	..	..	..	..	2
Arms and explosives—										
Ammunition factory	1	..	..	..	..	..	..	..	..	1

INDUSTRIES IN PROVINCIAL DISTRICTS—*continued.*

Manufactories, Works, &c.	Number of Industries in Provincial Districts.									Total Number of Industries.
	Auckland.	Taranaki.	Hawke's Bay.	Wellington.	Marlborough.	Nelson.	Westland.	Canterbury.	Otago.	
Machines, tools, and implements—										
Agricultural-implement factories	6	..	2	3	..	..	..	10	12	33
Brush and broom factories ..	6	..	..	1	..	..	..	3	2	12
Cutlery factory	1	..	..	..	..	..	..	..	..	1
Bellows factory	1	..	..	..	..	..	..	..	..	1
Carriages and vehicles—										
Coach building and painting works	33	11	12	44	4	9	1	26	20	160
Cycle factories	8	2	3	10	..	2	..	25	21	71
Harness, saddlery, and leatherware—										
Saddlery and harness factories	22	7	7	29	..	5	1	24	20	115
Whip-thong factories ..	..	..	..	1	..	..	..	..	1	2
Portmanteau factories ..	2	..	..	2	..	..	..	..	2	6
Tanning, fellmongering, and wool-scouring establishments	16	4	15	14	4	4	..	29	33	119
Ships, boats, and their equipment—										
Ship- and boat-building yards	17	..	..	3	..	1	..	2	9	32
Graving-docks and patent slips	3	..	..	1	..	..	..	2	1	7
Block and pump factory ..	1	..	..	..	..	..	..	..	..	1
Sail and oilskin factories ..	9	1	2	4	..	1	1	5	7	30
Furniture—										
Furniture and cabinetmaking	26	14	7	36	1	4	4	20	32	144
Venetian-blind works ..	2	..	..	5	..	..	..	2	3	12
Mattress factories	3	..	..	3	..	..	..	2	4	12
Wool, rug, and mat making..	..	..	..	..	..	..	..	..	2	2
Chemicals and by-products—										
Perfumery manufactory ..	1	..	..	..	..	..	..	..	..	1
Varnish manufactories ..	3	..	..	..	..	..	..	..	1	4
Ink manufactories	2	..	..	..	..	..	..	..	1	3
Starch manufactories ..	..	..	..	..	..	1	..	..	2	3
Chemical works	2	..	..	..	..	..	..	1	5	8
Hæmatite-paint factories ..	..	..	..	..	..	1	..	..	3	4
Sheep-dip factories.. ..	..	..	2	..	..	..	..	..	1	3
Match factories	..	..	..	1	..	..	..	..	1	2
Herbal-remedies factories ..	1	..	..	4	..	..	..	..	3	8
Blacking factories	1	..	..	1	..	..	..	..	1	3
Cocoanut-oil mill	2	..	..	..	..	..	..	..	..	2
Textile fabrics—										
Woollen-mills	1	..	..	1	..	..	..	3	5	10
Flock-mills	1	..	..	1	..	..	..	1	2	5
Cleaning and dyeing works ..	5	..	..	2	..	..	..	3	1	11
Dress—										
Tailoring establishments ..	32	12	3	67	..	10	7	22	22	175
Dressmaking and millinery establishments	41	8	12	78	5	9	3	69	65	290

INDUSTRIES IN PROVINCIAL DISTRICTS.—*continued.*

Manufactories, Works, &c.	Number of Industries in Provincial Districts.									Total Number of Industries.
	Auckland.	Taranaki.	Hawke's Bay.	Wellington.	Marlborough.	Nelson.	Westland.	Canterbury.	Otago.	
Dress—*continued.*										
Shirt-making establishments	4	1	..	7	..	1	..	4	8	25
Corset and belt manufactories	3	..	..	..	..	..	..	3	..	6
Clothing factories	7	..	..	3	..	..	..	3	8	21
Waterproof factories ..	1	..	..	2	..	..	..	1	2	6
Boot and shoe factories ..	31	4	..	24	..	2	3	27	35	126
Hat and cap factories ..	5	..	..	3	..	..	..	2	3	13
Hosiery factories	1	..	..	3	..	1	..	5	7	17
Fibrous materials—										
Rope and twine works ..	3	1	..	2	..	..	..	7	4	17
Bag and sack factory ..	..	..	..	..	..	..	..	..	1	1
Flax-mills	23	6	2	25	14	7	..	8	16	101
Returns not included in above..	40	5	3	4	..	6	..	13	3	74
Totals, Census, 1901 ..	752	267	160	707	61	198	78	648	809	3680
Deduct tailoring, dressmaking, shirt-making, and monumental masons' establishments, not included in accounts taken for 1896 and 1891	85	21	16	155	5	22	10	101	102	517
Totals, Census, 1901 (less deductions shown above)	667	246	144	552	56	176	68	547	707	3163
Totals, Census, 1896 ..	573	128	147	396	50	154	47	448	516	2459
Totals, Census, 1891 ..	577	68	85	333	77	142	51	380	541	2254

The provincial districts, arranged according to the number of industries belonging to each, specified in the last census returns, stand as under:—

	Number of Industries, excluding Mines and Quarries.		
	1901.	1896.	1891.
Otago	707	516	541
Auckland	667	573	577
Wellington	552	396	333
Canterbury	547	448	380
Taranaki	246	128	68
Nelson	176	154	142
Hawke's Bay	144	147	85
Westland	68	47	51
Marlborough	56	50	77

DETAILS OF THE PRINCIPAL INDUSTRIES.

The principal industries returned at the census of 1901, and particulars relating thereto, are given in detail in the following table. These industries are arranged in classes according to their nature :—

Details of the Principal Industries.

Nature of Industries.	Total Number of Industries.	Number of Hands employed.			Wages paid.			Amount of Power employed (Horse-power).	Value of all Materials used or operated upon during 1900.	Value of all Manufactures or Produce (including Repairs) for the Year 1900.*	Approximate Value of Land, Buildings, Machinery, and Plant.
		Males.	Females.	Total	Males.	Females.	Total.				
					£	£	£	H.-p.	£	£	£
Animal food—											
Meat freezing and preserving works†	34	2,172	49	2,221	198,306	1,419	199,725	7,057	252,290	3,720,475	893,720
Ham and bacon curing establishments†	39	185	11	196	13,891	496	14,387	250	115,656	159,564	62,192
Fish curing and preserving works†	28	135	2	137	7,445	73	7,518	..	7,714	25,173	17,235
Butter and cheese factories†	247	1,165	23	1,188	95,461	972	96,433	2,399	1,195,600	1,535,150	388,750
Rabbit-packing ..	7	62	..	62	3,200	..	3,200	..	..	..	362
Condensed-milk factory	1	17	16	33	..	..	..	39	..	..	..
Vegetable food—											
Grain-mills†	78	513	2	515	49,254	110	49,364	2,422	545,642	682,884	358,656
Biscuit factories† ..	20	454	213	667	34,231	4,545	38,776	291	117,383	197,989	90,243
Fruit-preserving and jam-making works†	13	85	82	167	6,317	1,758	8,075	117	42,404	58,092	20,935
Sugar-boiling and confectionery works	26	158	147	305	11,128	3,600	14,728	19	47,150	88,580	56,955
Sugar-refining works ..	1	256	..	256	..	..	..	922	..	..	..
Fruit-canning works ..	1	3	2	5	..	..	..	10	..	..	..
Baking-powder factories	11	19	10	29	1,074	181	1,255	17	9,318	18,163	18,200
Drinks, narcotics, and stimulants—											
Breweries†	74	677	5	682	83,493	77	83,570	632	158,212	553,627	294,592

* For information as to quantities manufactured or produced, see special tables in previous Year-book. Value of output, wages, &c., not shown where the number of establishments is so small that particulars might be identified. † For full particulars respecting these industries, see special tables in previous issues.

NOTE.—See note at end of Table.

Details of the Principal Industries—*continued.*

Nature of Industries.	Total Number of Industries.	Number of Hands employed.			Wages paid.			Amount of Power employed (Horse-power).	Value of all Materials used or operated upon during 1900.	Value of all Manufactures or Produce (including Repairs) for the Year 1900.*	Approximate Value of Land, Buildings, Machinery, and Plant.
		Males.	Females.	Total.	Males.	Females.	Total.				
Drinks, narcotics, and stimulants—*continued.*					£	£	£	H.-p.	£	£	£
Malthouses†	33	145	..	145	14,994	..	14,994	110	72,211	105,671	75,038
Colonial-wine making†..	14	49	10	59	2,320	92	2,412	14	3,019	10,330	18,183
Aerated-water factories†	125	437	15	452	31,771	284	32,055	250	63,835	151,811	105,178
Coffee and spice works ..	18	63	15	78	4,959	235	5,194	83	32,091	45,628	47,572
Tobacco manufactories	2	11	9	20	..	..	..	8	..	..	..
Cigarette manufactories	3	1	17	18	..	..	..	6	..	..	..
Sauce and pickle factories†	23	77	51	128	4,628	1,760	6,388	71	20,505	31,258	36,715
Vinegar works ..	4	13	10	23	1,179	258	1,437	4	3,284	6,824	4,480
Ice-factories	2	5	..	5	..	..	..	35	..	..	..
Animal matter (not otherwise classed)—											
Bone-mills	8	17	..	17	453	..	453	77	1,080	2,529	6,230
Soap and candle works†	24	224	8	232	19,009	239	19,248	346	112,623	158,649	66,809
Glue factory	1	5	..	5	..	..	..	28	..	..	..
Sausage-skin factories ..	10	98	..	98	8,689	..	8,689	..	17,845	30,674	3,949
Boiling-down works† ..	14	61	..	61	5,910	..	5,910	393	92,693	114,416	26,838
Manure works.. ..	5	30	..	30	1,872	..	1,872	63	31,652	37,769	10,266
Oleomargarine-works ..	1	9	..	9	..	..	..	50	..	..	..
Fat-refining works ..	1	14	..	14	..	..	..	18	..	..	..
Working in wood—											
Cooperages†	23	137	1	138	10,884	39	10,923	177	19,942	37,521	21,787
Saw-mills, sash and door factories†	334	6,805	7	6,812	513,622	266	513,888	8,744	..	1,268,689	703,620

Barrow and ladder factory	1	5	..	5	..	..	..	..	..	..	..
Woodware and turnery factories	28	154	2	156	11,779	82	11,861	176	19,146	37,552	28,227
Vegetable produce for fodder—											
Chaff-cutting establishments	55	265	1	266	9,829	26	9,855	391	130,507	169,313	46,786
Grass-seed dressing establishments	25	60	..	60	5,310	..	5,310	189	197,846	241,239	48,195
Paper manufacture—											
Paper-mills	3	79	19	98	..	..	..	705	..	..	..
Paper bag and box factories	7	24	57	81	1,312	1,936	3,248	13	4,471	14,217	11,499
Gasworks†	30	568	4	572	70,388	185	70,573	242	83,612	290,567	971,559
Electric-lighting works ..	6	52	..	52	6,226	..	6,226	2,158	4,603	23,234	64,156
Processes relating to stone, clay, glass, &c.—											
Lime and cement works†	15	184	..	184	16,577	..	16,577	466	18,397	45,142	38,436
Brick, tile, and pottery works†	108	838	..	838	63,336	..	63,336	659	..	122,230	114,567
Tobacco-pipe factory ..	1	2	2	4	..	..	..	..	..	..	..
Monumental masonry ..	27	81	..	81	7,072	..	7,072	13	8,689	22,313	17,391
Glassworks	2	9	..	9	..	..	..	..	..	..	..
Glass-bevelling works ..	2	7	..	7	..	..	..	13	..	..	..
Electro-plating works ..	2	11	..	11	..	..	..	7	..	..	..
Pumice-works ..	1	27	1	28	..	..	..	15	..	..	..
Metals, other than gold and silver—											
Tinware factories† ..	60	336	1	337	23,107	36	23,143	23	52,553	98,587	56,914
Iron and brass foundries, boiler-making, machinists, &c.†	65	1,950	5	1,955	162,477	170	162,647	983	240,578	508,906	211,282
Heel- and toe-plate factories	3	7	..	7	..	..	..	23	..	..	..

* For information as to quantities manufactured or produced, see special tables in previous Year-book. Value of output, wages, &c., not shown where the number of establishments is so small that particulars might be identified. † For full particulars respecting these industries, see special tables in previous issues. NOTE.—See note at end of Table.

Details of the Principal Industries—*continued.*

Nature of Industries.	Total Number of Industries.	Number of Hands employed.			Wages paid.			Amount of Power employed (Horse-power).	Value of all Materials used or operated upon during 1900	Value of all Manufactures or Produce (including Repairs) for the Year 1900.*	Approximate Value of Land, Buildings, Machinery, and Plant.
		Males.	Females.	Total.	Males.	Females.	Total.				
Metals other than gold and silver—*continued.*					£	£	£	H.-p.	£	£	£
Engineering works†‡ ..	37	1,437	5	1,442	127,374	261	127,635	541	186,208	361,958	155,081
Range-making works ..	9	193	..	193	16,927	..	16,927	53	19,721	53,307	27,919
Spouting and ridging factories	35	261	..	261	20,584	..	20,584	35	70,643	112,691	52,687
Lead-headed-nail works	1	3	..	3	..	..	..	..	..	..	..
Iron-pipe and fluming works	2	5	..	5	..	..	..	..	..	..	..
Books and publications—											
Printing offices†§ ..	188	2,627	507	3,134	268,041	16,564	284,605	956	200,243	704,285	559,538
Musical instruments—											
Musical-instrument factories	3	11	..	11	..	..	..	..	..	..	..
Ornaments, minor art products, and smallwares—											
Picture-frame makers ..	9	19	3	22	1,234	69	1,303	1	2,497	5,771	11,750
Basket and perambulator factories	21	107	11	118	6,517	494	7,011	9	6,902	17,942	18,180
Cork-cutting	1	3	..	3	..	..	..	..	..	..	..
Lapidaries	3	8	..	8	..	..	..	7	..	..	..
Equipment for sports and games—											
Billiard table factories ..	3	7	..	7	..	..	..	..	..	..	..
Designs, medals, type, and dies—											
Rubber-stamp making ..	2	3	..	3	..	..	..	..	..	..	..

Arms and explosives—											
Ammunition-factory ..	1	21	84	105	..	..	..	39	..	..	
Machines, tools, and implements—											
Agricultural implement factories†	33	584	2	586	53,879	62	53,941	360	49,072	138,094	61,339
Brush and broom factories	12	86	42	128	5,965	1,190	7,155	32	10,158	21,131	13,829
Cutlery-factory ..	1	2	..	2	..	..	..	2	..	..	..
Bellows-factory ..	1	2	..	2	..	..	..	..	..	..	..
Carriages and vehicles—											
Coach-building and painting works†	160	1,185	...	1,185	83,356	..	83,356	128	88,229	216,077	150,811
Cycle-factories† ..	71	378	17	395	20,873	570	21,443	95	26,824	65,047	65,403
Harness, saddlery, and leatherware—											
Saddlery and harness factories†	115	629	23	652	40,808	1,026	41,834	3	75,724	147,626	96,559
Whip-thong factories ..	2	5	..	5	..	..	..	..	..	..	..
Portmanteau factories ..	6	19	3	22	1,206	117	1,323	..	2,741	5,483	6,460
Tanning, fellmongering, and wool-scouring establishments†	119	1,957	6	1,963	159,180	162	159,342	1,108	1,391,323	1,888,107	235,952
Ships, boats, and their equipment—											
Ship- and boat-building yards†	32	211	..	211	13,476	..	13,476	49	20,389	45,811	15,198
Graving-docks and patent slips	7	32	..	32	2,864	..	2,864	435	..	7,264	230,165
Block and pump factory	1	2	..	2	..	..	..	4	..	..	..
Sail and oilskin factories†	30	150	81	231	10,446	1,996	12,442	..	24,628	44,854	40,893
Furniture—											
Furniture and cabinet-making†	144	1,243	67	1,310	88,843	2,262	91,105	369	101,595	241,024	170,338
Venetian-blind works ..	12	49	2	51	3,567	65	3,632	19	5,896	13,233	7,469
Mattress-factories ..	12	55	..	55	3,260	..	3,260	20	9,212	16,296	13,165
Wool, rug, and mat making	2	9	8	17	..	..	..	..	..	..	..

* For information as to quantities manufactured or produced, see special tables in previous Year-book. Value of output, wages, &c., not shown where the number of establishments is so small that particulars might be identified. † For full particulars respecting these industries, see special tables in previous issues. ‡ Value of manufactures at Government Railway Workshops not included. § Value of manufactures at Government Printing Office not included. NOTE.—See note at end of table.

Details of the Principal Industries—*continued.*

Nature of Industries.	Total Number of Industries.	Number of Hands employed.			Wages paid.			Amount of Power employed (Horse-power).	Value of all Materials used or operated upon during 1900.	Value of all Manufactures or Produce (including Repairs) for the Year 1900.*	Approximate Value of Land, Buildings, Machinery, and Plant.
		Males.	Females.	Total.	Males.	Females.	Total.				
					£	£	£	H.-p.	£	£	£
Chemicals and by-products—											
Perfumery-manufactory	1	1	3	4	..	..	..	..	..	..	..
Varnish-manufactories	4	19	..	19	1,474	..	1,474	37	4,227	6,732	5,765
Ink-manufactories	3	5	..	5	..	..	..	8	..	..	..
Starch-manufactories	3	24	8	32	..	..	..	16	..	..	..
Chemical-works	8	76	19	95	7,551	504	8,055	92	42,479	64,834	37,793
Hæmatite-paint factories	4	12	..	12	609	..	609	28	1,030	2,578	5,943
Sheep-dip factories	3	6	1	7	..	..	..	10	..	..	..
Match-factories	2	37	146	183	..	..	..	19	..	..	..
Herbal-remedies factories	8	13	10	23	1,134	581	1,715	12	3,994	18,396	10,305
Blacking-factories	3	2	1	3	..	..	..	7	..	..	..
Cocoanut-oil mills	2	10	..	10	..	..	..	54	..	..	..
Textile fabrics—											
Woollen-mills†	10	769	924	1,693	71,454	40,547	112,001	1,554	196,081	359,382	277,422
Flock-mills	5	9	1	10	559	12	571	55	1,459	4,105	2,650
Cleaning and dyeing works	11	28	23	51	1,816	837	2,653	13	2,141	7,855	9,635
Dress—											
Tailoring establishments	175	722	899	1,621	65,695	37,251	102,946	8	122,853	301,356	211,016
Dressmaking and millinery establishments	290	23	2,865	2,888	2,236	76,270	78,506	..	173,211	312,436	193,998
Shirt-making establishments	25	28	503	531	1,911	13,651	15,562	40	45,319	75,879	26,528
Corset and belt manufactories	6	1	24	25	9	542	551	..	959	2,249	5,659
Clothing-factories†	21	431	2,081	2,512	37,778	63,023	100,801	67	177,828	329,026	89,247

Dress—*continued.*											
Waterproof-factories† ..	6	22	92	114	1,807	2,822	4,629	3	6,285	13,378	7,845
Boot and shoe factories†	126	1,906	790	2,696	165,227	27,216	192,443	184	273,325	529,254	176,992
Hat and cap factories ..	13	37	80	117	2,641	2,748	5,389	20	11,463	25,641	19,217
Hosiery-factories† ..	17	17	265	282	1,328	6,702	8,030	71	18,032	31,265	19,997
Fibrous materials—											
Rope and twine works† ..	17	192	..	192	13,136	..	13,136	494	46,378	87,863	55,309
Bag and sack factory ..	1	..	6	6	..	..	..	..	..	..	..
Flax-mills†	101	1,698	..	1,698	101,046	..	101,046	1,190	53,064	203,492	64,446
Values for industries of which less than four of any one sort were found in the returns ..	..	..	..	..	53,927	9,235	63,162	..	526,252	694,896	258,885
Returns not included in above	74	140	156	296	10,952	4,836	15,788	138	28,834	61,749	59,659
Totals, Census, 1901	3,680	36,292	10,555	46,847	2,972,193	330,454	3,302,647	39,113	7,749,770	17,853,133§	8,408,564
Deduct tailoring, dressmaking, shirtmaking, and monumental masons' establishments, not included in accounts taken for 1896 and 1891 ..	517	854	4,267	5,121	76,914	127,172	204,086	61	350,072	711,984	448,933
Totals, Census, 1901 (less deductions shown above)	3,163	35,438	6,288	41,726	2,895,279	203,282	3,098,561	39,052	7,399,698	17,141,149	7,959,631
Totals, Census, 1896	2,459	22,986	4,403	27,389	1,776,076	131,516	1,907,592	28,096	3,285,247	9,549,360	5,796,017
Totals, Census, 1891	2,254	22,664	2,969	25,663	1,705,641	102,999	1,808,640	21,696	..	8,773,837	5,261,826

* For information as to quantities manufactured or produced, see special tables in previous Year-book. Value of output, wages, &c., not shown where the number of establishments is so small that particulars might be identified. † For full particulars respecting these industries, see special tables in previous issues. § See remarks on page 230.

NOTE.—Two or more distinct industries were carried on at some establishments. In such cases particulars of power, hands, and plant employed, and wages paid, unless stated separately for each branch of industry, have been treated as belonging to the most important work.

The succeeding statement shows the most important industries in operation in 1901, ranged in order of the values of their output for 1900, and compared with the results obtained for the years 1895, 1890, and 1885:—

	Total Value of all Manufactures or Produce, including Repairs.			
	1900. £	1895. £	1890. £	1885. £
Meat-freezing and preserving and boiling-down works	3,834,891	1,652,275	1,464,659	543,878
Tanning, fellmongering, and wool-scouring	1,888,107	1,237,252	1,026,349	634,915
Butter and cheese factories	1,535,150	501,274	150,957	43,094
Sawmills, sash and door factories	1,268,689	898,807	832,959	1,177,713
Iron and brass foundries, boiler-making, machinists, &c. (not including Government Railway Workshops)	924,171	302,815	403,635	368,919
Clothing and boot-and-shoe factories	858,280	616,158	570,315	514,506
Printing establishments (not including Government Printing Office)	704,285	389,124	354,559	273,886
Grain mills	682,884	874,656	991,812	754,830
Breweries and malthouses	659,298	418,830	380,849	421,197
Woollen mills	359,382	302,423	279,175	194,311
Gasworks	290,567	199,025	178,947	194,653
Grass-seed dressing establishments	241,239	..	..	..
Furniture and cabinetmaking	241,024	85,327	131,314	162,375
Coach-building and painting works	216,077	148,969	139,660	128,346
Flax-mills	203,492	32,546	234,266	20,059
Biscuit factories	197,989	118,979	127,147	47,784
Chaff-cutting works	169,313	78,497	63,236	54,440
Bacon-curing establishments	159,564	86,022	83,435	58,799
Soap and candle works	158,649	152,298	155,714	130,745
Aërated-water factories	151,811	98,609	91,691	94,098
Saddlery and harness factories	147,626	63,735	37,347	..
Agricultural implement factories	138,094	102,054	144,472	111,823
Brick, tile, and pottery works	122,230	66,140	56,830	91,797
Spouting and ridging works	112,691	23,762	33,140	25,478
Tinware factories	98,587	63,723	14,297	8,500
Sugar-boiling and confectionery works	88,580	33,235	17,248	17,130
Rope and twine works	87,863	52,400	76,711	56,413
Cycle factories	65,047	18,817	5,655	1,301
Chemical works	64,834	75,320	41,568	34,283
Fruit-preserving and jam-making works	58,092	36,108	27,255	32,292
Ship and boat-building works	45,811	25,233	35,847	56,132
Coffee and spice works	45,628	74,339	64,024	98,234
Lime and cement works	45,142	15,881	19,416	16,928
Sail, tent, and oilskin factories	44,854	30,166	31,083	25,574
Bone-mills and other manure works	40,298	12,246	4,628	8,337
Woodware and turnery factories	37,552	18,276	9,050	..
Cooperages	37,521	19,233	11,540	11,862
Hosiery factories	31,265	9,357	5,650	6,200
Sauce and pickle works	31,258	13,417	6,407	3,145
Sausage-skin factories	30,674	13,472	10,582	..

	Total Value of all Manufactures or Produce, including Repairs.			
	1900.	1895.	1890.	1885.
	£	£	£	£
Hat and cap factories	25,641	10,902	21,628	13,695
Fish-curing and preserving works	25,173	10,292	19,537	12,182
Electric-lighting works ..	23,234	..	..	..
Brush and broom factories ..	21,131	23,363	13,340	7,786
Herbal-remedies factories ..	18,396	..	..	..
Baking-powder factories ..	18,163	10,153	5,637	4,120
Basket and perambulator factories	17,942	11,920	7,381	4,375
Mattress factories	16,296	..	..	..
Paper-bag and cardboard box factories	14,217	7,698	4,497	..
Waterproof factories	13,378	22,354	..	..
Venetian blind factories ..	13,233	9,878	4,776	6,470
Colonial-wine works	10,330	8,963	3,456	3,626
Other industries in respect of which the value of the manufactures was less than £8,000, and sundry	805,606	473,037	380,156	235,148

The order of the principal industries, ranged according to the number of hands employed, is as follows:—

	Number of Hands.		
	1901.	1896.	1891.
Sawmills, sash and door factories	6,812	4,059	3,266
Clothing and boot and shoe factories	5,208	4,407	3,233
Iron and brass foundries, boiler-making, machinists, &c.	3,590	1,642	1,787
Printing establishments (excluding Government Printing Office)	3,134	2,351	2,569
Meat freezing, preserving, and boiling-down works ..	2,282	2,037	1,568
Tanning, fellmongering, and wool-scouring establishments	1,963	1,629	1,196
Flax-mills	1,698	647	3,204
Woollen mills	1,693	1,416	1,175
Furniture and cabinet-making factories	1,310	496	585
Butter and cheese factories	1,188	576	269
Coach-building and painting works	1,185	807	678
Brick, tile, and pottery works	838	455	494
Breweries and malthouses	827	560	563
Biscuit factories	667	425	331
Saddlery and harness factories	652	266	184
Agricultural implement factories	586	581	528
Gasworks	572	295	249
Grain-mills	515	419	499
Aerated-water factories	452	347	261
Cycle factories	395	125	31
Tinware factories	337	289	93
Sugar-boiling and confectionery works	305	69	53
Hosiery factories	282	133	51
Chaff-cutting works	266	212	205
Spouting and ridging works	261	90	100
Sugar-refining works	256	160	110
Soap and candle works	232	190	209
Sail, tent, and oilskin factories	231	143	124
Ship- and boat-building yards	211	108	145
Bacon-curing establishments	196	123	84

	Number of Hands.		
	1901.	1896.	1891.
Rope and twine works	192	150	222
Lime and cement works	184	79	98
Match factories	183	121	..
Fruit-preserving and jam-making works	167	193	117
Woodware and turnery factories	156	81	51
Cooperages	138	76	53
Fish-curing and preserving works	137	75	140
Brush and broom factories	128	92	81
Sauce and pickle works	128	68	41
Basket and perambulator factories	118	76	63
Hat and cap factories	117	72	112
Waterproof factories	114	93	..
Ammunition factories	105	90	80
Sausage-skin factories	98	56	73
Paper mills	98	84	48
Chemical works	95	114	55
Paper-bag and cardboard-box factories	81	86	35
Coffee and spice works	78	119	81
Rabbit preserving and packing works	62	32	..
Grass-seed dressing establishments	60	..	..
Colonial-wine works	59	53	24
Mattress factories	55	..	..
Electric-lighting works	52	..	..
Venetian-blind factories	51	45	29
Cleaning and dyeing works	51	58	48
Bone-mills and other manure works	47	46	25
Condensed-milk factory	33	..	..
Graving docks and patent slips	32	29	64
Starch and soda works	32	27	13
Baking-powder factories	29	..	..
Pumice works	28	20	..
Corset and belt manufactories	25	..	..
Herbal-remedies factories	23	..	..
Vinegar works	23	..	..
Portmanteau factories	22	..	..
Picture-frame makers	22	..	..
Tobacco manufactories	20	..	..
Sheep-dip factories	7	29	..
Industries employing under 20 hands	532	268	36

Special tables relating to the principal industries with comments on each, have been printed in the Year-books for 1901, 1902, and 1903.

SECTION VII.—TRANSPORT AND COMMUNICATION.

Shipping.

The shipping entered inwards during 1903 comprised 617 vessels, of 1,102,064 tonnage; while entered outwards were 608 vessels, of 1,113,165 tons. Comparison with the figures for the previous year shows in the entries a decrease of 21 vessels and an increase of 12,885 tons, and in the clearances a decrease of 3 vessels and an increase of 64,395 tons. Of the vessels inwards, 145, of 455,741 tons, were British; 403, of 478,419 tons, colonial; and 69, of 167,904 tons, foreign. Those outwards numbered 141, of 462,122 tons, British; 401, of 485,337 tons, colonial; and 66, of 165,706 tons, foreign. Compared with the figures for 1902 there was a decrease of 27 vessels and of 40,462 tons in British vessels entered, and an increase in the colonial shipping entered of 8 vessels and 48,952 tons. Foreign shipping shows a decrease of 2 in the number of vessels entered, and an increase of 4,395 tons. Of the entries in 1903, 215, of 111,725 tons, were sailing-vessels, and 402, of 990,339 tons, steamers. Of the clearances, 212, of 113,081 tons, were sailing-vessels, and 396, of 1,000,084 tons, steamers. The shipping inwards and outwards for ten years is given in the table following:—

Vessels entered, 1894–1903.

Year.	Total Number.			British.			Colonial.			Foreign.		
	Vessels.	Tons.	Crews.	Vessels.	Tons.	Crews.	Vessels.	Tons.	Crews.	Vessels.	Tons.	Crews.
1894 ..	609	631,100	21,834	141	271,994	6,456	423	306,547	13,279	45	52,559	2,099
1895 ..	611	672,951	22,074	146	299,667	6,837	420	319,313	13,209	45	53,971	2,028
1896 ..	589	614,097	19,857	126	249,601	5,495	395	300,176	12,210	68	64,320	2,152
1897 ..	600	686,899	21,542	133	276,020	6,086	395	340,793	13,138	72	70,086	2,318
1898 ..	620	765,255	24,081	152	329,065	7,910	399	369,840	13,897	69	66,350	2,274
1899 ..	609	811,183	23,929	149	350,861	6,986	388	392,671	14,666	72	67,651	2,277
1900 ..	616	854,632	23,791	156	392,394	7,183	393	392,519	14,135	67	69,719	2,473
1901 ..	688	1,063,274	29,724	175	448,688	7,713	441	461,729	16,063	72	152,857	5,948
1902 ..	638	1,089,179	30,264	172	496,203	8,871	395	429,467	15,305	71	163,509	6,088
1903 ..	617	1,102,064	30,600	145	455,741	7,799	403	478,419	16,497	69	167,904	6,304

Vessels cleared, 1894–1903.

1894 ..	614	631,250	21,934	140	270,464	6,437	432	310,050	13,527	42	50,736	1,970
1895 ..	597	648,946	21,619	134	281,840	6,528	420	315,171	13,068	43	51,935	2,023
1896 ..	592	627,659	20,217	123	259,064	5,637	402	305,926	12,448	67	62,669	2,132
1897 ..	587	675,333	21,409	140	280,229	6,240	378	327,068	12,881	69	68,036	2,288
1898 ..	622	765,793	24,130	150	322,150	7,898	403	377,102	13,948	69	66,541	2,284
1899 ..	604	807,866	24,117	152	355,442	7,194	379	386,219	14,656	73	66,205	2,267
1900 ..	613	825,275	23,481	149	368,241	6,978	397	388,436	14,153	67	68,598	2,350
1901 ..	691	1,075,906	30,028	177	462,179	7,954	441	458,994	16,106	73	154,733	5,968
1902 ..	611	1,048,770	29,294	152	447,351	7,983	385	437,489	15,171	74	163,930	6,140
1903 ..	608	1,113,165	30,660	141	462,122	7,890	401	485,337	16,503	66	165,706	6,267

Note.—Coasting-vessels are not included in the above table.

The noticeable feature in the operations for the decennium is a considerable increase of tonnage inwards and outwards, but not in the numbers of vessels, showing that larger ships are now used than those of ten years ago.

The figures given apply to the external trade only; but in a new country such as New Zealand, as yet deficient in roads, but having an extensive seaboard and a number of good harbours, the coastal trade must be relatively very large, as is evidenced by the figures next given:—

Shipping entered Coastwise, 1903.

	Number.	Tons.
Sailing-vessels	4,984	330,894
Steamers	18,453	8,885,327

Shipping cleared Coastwise, 1903.

	Number.	Tons.
Sailing-vessels	4,786	318,145
Steamers	18,362	8,948,835

The total number of vessels entered coastwise was thus 23,437, of 9,216,221 tons, an increase of 1,633 vessels and 966,598 tons on the figures for 1902. The total clearances coastwise were 23,148 vessels, of 9,266,980 tons, an increase of 1,379 vessels and 957,345 tons on the number for the previous year.

Registered Vessels.

The number and tonnage of the registered vessels belonging to the several ports on the 31st December, 1903 (distinguishing sailing-vessels and steamers), was as under:—

Registered Vessels, 31st December, 1903.

Ports.	Sailing-vessels.			Steam-vessels.		
	Vessels.	Gross Tonnage.	Net Tonnage.	Vessels.	Gross Tonnage.	Net Tonnage.
Auckland	201	18,930	17,622	101	13,334	7,821
Napier	8	601	588	16	1,487	809
Wellington	19	3,117	2,998	29	5,821	3,049
Nelson	10	322	310	10	999	604
Lyttelton	32	6,469	6,186	9	2,178	911
Dunedin	51	15,270	14,914	67	80,837	49,473
Invercargill	14	1,333	1,279	3	211	55
Totals	335	46,042	43,897	235	104,867	62,722

Railways.

The history and progress of railways in New Zealand was specially described in the Year-book of 1894, as was also the line partly built by the New Zealand Midland Railway Company. An account of the line belonging to the Wellington and Manawatu Railway Company was published in the Year-book for 1895.

The length of Government railways open for traffic on the 31st March, 1904, was 2,328 miles, of which 901 were situated in the North Island and 1,427 in the Middle Island.

The sections of the North Island lines consist of the Kawakawa, 8 miles; Whangarei, 23; Kaihu, 17; Auckland, 374; Gisborne–Karaka, 13 miles; and the Wellington–Napier–New Plymouth, 466 miles. The Middle Island sections comprise the Hurunui–Bluff, with branches, 1,217 miles; Westland, 112; Westport, 31; Nelson, 33; Picton, 34 miles. The estimated total cost of construction has been £20,692,911 (besides £1,480,309 spent on unopened lines), and the average cost per mile of open line £8,889.

The following statement shows the number of miles of Government railways open, the number of train-miles travelled and of passengers carried, and the tonnage of goods traffic, for the past fourteen years:—

Year.	Length open.	Train-mileage.	Passengers.	Season Tickets issued.	Goods and Live-stock.*
					Tons.
1890–91	1,842	2,894,776	3,433,629	13,881	2,134,023
1891–92	1,869	3,010,489	3,555,764	16,341	2,122,987
1892–93	1,886	3,002,174	3,759,044	16,504	2,258,235
1893–94	1,948	3,113,231	3,972,701	17,226	2,128,709
1894–95	1,993	3,221,620	3,905,578	28,623	2,123,343
1895–96	2,014	3,307,226	4,162,426	36,233	2,175,943
1896–97	2,018	3,409,218	4,439,387	43,069	2,461,127
1897–98	2,055	3,666,483	4,672,264	48,660	2,628,746
1898–99	2,090	3,968,708	4,955,553	55,027	2,744,441
1899–1900 ..	2,104	4,187,893	5,468,284	63,335	3,251,716
1900–1901 ..	2,212	4,620,971	6,243,593	82,921	3,461,331
1901–1902 ..	2,235	5,066,360	7,356,136	100,778	3,667,039
1902–1903 ..	2,291	5,443,333	7,575,390	118,431	3,918,261
1903–1904 ..	2,328	5,685,399	8,306,383	129,919	4,259,217

The traffic in local products for the past fourteen years was:—

Year.	Wool.	Timber.	Grain.	Minerals.	Horses and Cattle.	Sheep and Pigs.
	Tons.	Tons.	Tons.	Tons.	Number.	Number.
1890–91 ..	87,701	153,078	528,683	828,079	44,999	1,313,155
1891–92 ..	85,888	170,521	442,277	873,899	47,618	1,117,253
1892–93 ..	96,842	169,910	523,637	884,031	46,590	1,359,860
1893–94 ..	101,340	183,192	411,191	864,538	51,573	1,394,456
1894–95 ..	103,328	198,578	388,556	857,917	52,075	1,563,213
1895–96 ..	99,363	213,132	374,699	878,659	50,766	1,893,058
1896–97 ..	98,958	257,825	423,888	1,032,252	47,256	2,016,437
1897–98 ..	103,055	313,073	427,448	1,048,868	54,871	2,399,379
1898–99 ..	97,396	310,266	420,071	1,147,353	66,226	2,552,745
1899–1900 ..	104,621	334,677	764,033	1,218,698	76,537	2,559,836
1900–1901 ..	96,519	380,803	772,571	1,366,241	84,289	2,463,250
1901–1902 ..	101,878	427,153	813,345	1,443,792	95,384	2,780,019
1902–1903 ..	116,309	436,008	718,376	1,604,426	115,198	3,883,177
1903–1904 ..	101,316	509,712	820,453	1,744,323	122,064	3,826,646

* The equivalent tonnage for live-stock has been given.

The cash revenue for the year 1903–1904 amounted to £2,180,641; and the total expenditure to £1,438,724. The net cash revenue—£741,917—was equal to a rate of £3 11s. 8d. per cent. on the capital cost; the percentage of expenditure to revenue was 65·98. The earnings on some of the lines ranged as high as £7 15s., and even £10 0s. 6d., per cent.

The particulars of the revenue and expenditure for the past fourteen years are given herewith:—

Year.	Passenger Fares.	Parcels Luggage and Mails.	Goods and Live-stock.	Rents and Miscellaneous.	Total.	Expenditure.	Net Revenue.	Percentages of Expenditure to Revenue.	Percentages Revenue to Capital Cost.		
	£	£	£	£	£	£	£	%	£	s.	d.
1890–91	353,593	38,997	690,779	38,332	1,121,701	700,703	420,998	62·47	2	18	11
1891–92	364,617	41,795	671,469	37,550	1,115,431	706,517	408,914	63·34	2	15	9
1892–93	390,619	44,801	707,785	38,316	1,181,521	732,141	449,380	61·97	3	1	0
1893–94	402,019	45,206	686,469	39,098	1,172,792	735,358	437,434	62·70	2	17	9
1894–95	385,149	43,270	683,726	38,706	1,150,851	732,160	418,691	63·62	2	14	6
1895–96	389,234	54,736	698,115	40,956	1,183,041	751,368	431,673	63·51	2	16	0
1896–97	410,160	58,084	774,163	43,751	1,286,158	789,054	497,104	61·35	3	3	10
1897–98	433,430	60,872	837,589	44,117	1,376,008	857,191	518,817	62·30	3	4	10
1898–99	475,553	66,418	882,077	45,617	1,469,665	929,737	539,928	63·26	3	5	10
1899–00	515,020	68,488	985,723	54,660	1,623,891	1,052,358	571,533	64·80	3	8	5
1900–01	544,976	72,712	1,051,694	57,854	1,727,236	1,127,847	599,389	65·30	3	9	8
1901–02	621,019	79,561	1,110,575	63,431	1,874,586	1,252,237	622,349	66·80	3	8	6
1902–03	625,698	87,273	1,189,101	71,966	1,974,038	1,343,415	630,623	68·05	3	6	1
1903–04	704,660	11 ,151	1,293,169	72,661	2,180,641	1,438,724	741,917	65·98	3	11	8

NOTE.—For 1895–96 and subsequent years the railways have been credited with the value of services performed for other Government departments, and debited with the value of work done for the railways by other departments.

The revenue per (average) mile of railway open during the year was £946, and the expenditure £624; equal to 7s. 8d. and 5s. per train-mile respectively.

The total number of miles travelled by trains was 5,685,399.

In addition to the above railways, there were 113 miles of private lines open for traffic on the 31st March, 1904—including the Wellington–Manawatu Railway, 84 miles.

The cost of the construction of the Wellington–Manawatu Railway is now returned as £805,446, being at the rate of £9,589 per mile. The term "cost of construction," as applied to railways, includes value of equipment, rolling-stock, &c., not merely the road-line and buildings. The gross earnings for the twelve months ended the 28th February, 1904, amounted to £122,183, and the working-expenses to £63,682, equivalent to 52·12 per cent. of the revenue.

Australasian Railways.

The following statement gives the average number of miles of Government railways open for traffic in Australasia in 1902–1903:—

Railways (State only).

State or Colony.	Year ended	Average Miles open.	Train Miles Run.	Cost of Construction of Open Lines.	Gross Receipts.	Working Expenses.	Percentage of Net Revenue to Cost.	Number of		
								Locomotives.	Vehicles.	
									Passenger.	Goods and Livestock.
				£	£	£	%			
Queensland ..	30 June, 1903	2,777	4,947,242	20,302,177	1,234,230	863,382	1·83	342	446	7,302
New South Wales ..	30 June, 1903	3,074	11,548,338	41,654,977	3,314,893	2,266,299	2·52	559	823	12,791
Victoria	30 June, 1903	3,335½	10,286,272	40,974,493	3,046,858	1,938,580	2·70	553	1,179	10,257
South Australia ..	30 June, 1903	1,882	3,800,773	14,575,852	1,087,910	637,323	3·09	352	442	6,428
Western Australia ..	30 June, 1903	1,434	4,611,315	8,141,782	1,553,485	1,247,873	3·75	316	264	5,694
Tasmania	31 Dec., 1902	*462	902,918	†3,840,747	233,211	173,293	1·56	75	172	1,474
New Zealand ..	31 Mar., 1904	2,305	5,685,399	20,692,911	2,180,641	1,438,724	3·58	377	809	13,433

* Includes 7½ miles private lines worked by Government. † State railways only.

In addition to the Government lines open for traffic in 1903, New South Wales had 81½ miles of private railway; Western Australia, 629 miles (partly used for timber conveyance); Queensland, 102; Tasmania, 158½ miles, 7½ miles of which are worked by Government; and New Zealand, on 31st March, 1904, 113 miles.

Postal and Electric Telegraph.

There were 1,844 post-offices in New Zealand at the end of 1903.

The number of letters, letter-cards, post-cards, books, and pattern-packets, newspapers, and parcels dealt with during the year, compared with the number handled in 1902, was as under:—

	Total Number dealt with. 1903.	1902.	Increase.
Letters	60,512,647	56,689,256	3,823,391
Letter-cards	1,174,810	1,025,375	149,435
Post-cards	1,453,463	1,302,167	151,296
Books and pattern-packets	19,567,734	18,626,324	941,410
Newspapers	19,696,434	18,517,276	1,179,158
Parcels	327,629	291,670	35,959

The average number of letters, &c., posted per head of the population in each of the past five years was,—

	1899.	1900.	1901.	1902.	1903.
Letters and letter-cards	47·77	49·01	63·49	68·07	70·38
Post-cards	2·12	2 43	1·88	1·55	1·68
Books and parcels	21·68	21·10	21·09	21·45	21·80
Newspapers	15·13	16·17	17·81	16·79	17·20

The facilities afforded for the transmission of parcels through the Post Office to places within and without the colony have proved of much convenience to the public. The regulations admit of parcels up to 11 lb. in weight being sent to almost all the important countries of the world.

The following table shows the number of parcels exchanged with the United Kingdom, the Australian States, &c., in 1902 and 1903:—

Country.	Number of Parcels.			
	Received.		Despatched.	
	1902.	1903.	1902.	1903.
United Kingdom and foreign countries *viâ* London	28,881	37,652	6,225	7,575
United States	4,123	5,024	1,085	1,286
Vancouver	303	353	168	167
Victoria	4,071	5,058	1,961	2,365
New South Wales	7,705	8,865	2,704	3,322
South Australia	380	347	246	325
Queensland	507	449	359	453
Tasmania	237	349	464	496
Western Australia	235	291	310	394
Samoa	*12	12	143	170
Rarotonga	†21	..	†27	..
Fiji	48	73	251	286
Ceylon	209	260	54	78
Uruguay	..	..	24	21
Cape Colony	396	352	407	396
Transvaal	..	..	‡151	..
Natal	174	84	64	89
India	352	486	136	154
Totals	47,654	59,655	14,779	17,577

* Four months only. † Five months only. ‡ Seven months only.

The declared value of the parcels received from places outside the colony was £151,236, on which the Customs duty amounted to £31,032.

The number and weight of parcels dealt with from 1895 to 1903 are given. The word "parcels" in the first-named table includes the parcels herein mentioned :—

—	1895.	1896.	1897.	1898.	1899.	1900.	1901.	1902.	1903.
Parcels, No. ...	176,206	186,611	197,554	204,603	223,350	233,456	273,442	291,670	327,629
Weight, lb. ...	582,193	654,333	676,054	698,301	765,836	794,994	928,237	1,034,342	1,161,584

Money-orders and Postal Notes.

The number of offices open for the transaction of money-order business at the end of 1903 was 510.

During 1903, 396,312 money-orders, for a total sum of £1,416,224 12s. 4d., were issued at the various post-offices in the colony. The money-orders from places beyond New Zealand and payable in the colony numbered 30,812, for the amount of £117,521 9s. 11d.

The number of offices open for the sale of postal notes at the end of 1903–1904 was 603 : 707,044 postal notes were sold, value £220,069 11s. Commission amounted to £4,795 3s. 4½d.

The notes paid numbered 704,031, value £219,312 2s. 6d.

Mail-services.

The cost of the various mail-services between England and New Zealand was, in 1903, as follows :—

San Francisco Service. 1903.

	£	s.	d.
Payments—			
Subsidies, &c.	25,534	8	7
Interprovincial and other charges ..	5,352	0	10
	£30,886	9	5
Receipts—			
Contributions from Fiji	45	1	8
Postages collected in the colony	16,044	18	10
	£16,090	0	6
Loss to the colony	£14,796	8	11

Peninsular and Oriental and Orient Lines Services.

	£	s.	d.
Payments—			
To P. and O. and Orient Lines	4,030	12	9
Transit across Australia	169	19	0
„ European Continent ..	411	2	10
Intercolonial services	1,912	5	11
	£6,524	0	6

Receipts—	£	s.	d.
Postages collected from England and from foreign offices	1,402	16	0
Postages collected in the colony	2,155	15	8
	£3,558	11	8
Loss to the colony	£2,965	8	10

The total amount of postages collected and contributions received for these services in 1903 was £19,648 12s. 2d.

The average number of days in 1903 within which the mails were delivered between London and each of the undermentioned ports in New Zealand was :—

London to—	San Francisco Service.	P. and O. Line.	Orient Line.
Auckland	30·47	37·62	38·81
Wellington	31·65	38·92	39·46
Dunedin	32·76	38·94	39·25
Bluff	33·51	38·19	38·50

Electric Telegraph.

There were 7,779 miles of telegraph-line open at the end of March, 1904, carrying 22,920 miles of wire. 4,965,197 telegrams were transmitted during the year; of these, the private and Press messages numbered 4,671,904, which, together with telephone exchange and other telegraph receipts, yielded a revenue of £237,564 4s. 11½d.

There were twenty-seven central exchanges and fifty-five sub-exchanges on the 31st March, 1904. The number of connections increased from 10,633 in March, 1903, to 12,105 in March, 1904. The subscriptions to these exchanges during the financial year amounted to £71,028 6s. 3d.

The capital expended on the equipment, &c., of the several telephone exchanges up to the 31st March, 1904, was £241,903 2s. 6d.

Pacific Cable.

The cable, which was opened for traffic between New Zealand and Australia and Fiji on the 9th April, 1902, was completed to Bamfield, Vancouver Island, on the 31st October following, and opened for international business on the 8th December, 1902.

The route is from Doubtless Bay, New Zealand, to Vancouver, Canada, *viâ* Norfolk Island, Fiji, and Fanning Island. The Australian connection is at Norfolk Island. The deep-sea portion of the Vancouver–Fanning Island cable is stated to be the longest in the world. Following the opening of the cable a much faster service between the colony, America, and Europe has resulted.

SECTION VIII.—VITAL STATISTICS.

Births.

The number of births registered in the colony during 1903 was 21,829, or 26·61 in every 1,000 persons living. The rate is the highest reached since the year 1895, the number of births being 1,174 in excess of that for the year 1902, an increase of 5·67 per cent. From 1882 until the year 1899 there was a regular fall in the birth-rate. The number of births registered in a year reached 19,846 in 1884, and, after falling to 17,876 in 1892, has risen to 21,829 in 1903 as stated above.

The figures for each year from 1882 are worthy of notice, especially in connection with the subsequent particulars given as to marriages solemnised and the growth of population :—

Year.	Number of Births.	Rate per 1,000 of Population.	Year.	Number of Births.	Rate per 1,000 of Population.
1882	19,009	37·32	1893	18,187	27·50
1883	19,202	36·28	1894	18,528	27·28
1884	19,846	35·91	1895	18,546	26·78
1885	19,693	34·35	1896	18,612	26·33
1886	19,299	33·15	1897	18,737	25·96
1887	19,135	32·09	1898	18,955	25·74
1888	18,902	31·22	1899	18,835	25·12
1889	18,457	30·07	1900	19,546	25·60
1890	18,278	29·44	1901	20,491	26·34
1891	18,273	29·01	1902	20,655	25·89
1892	17,876	27·83	1903	21,829	26·61

The marriages have increased numerically, and the population of the colony also.

Year.	Number of Marriages.	Mean Population (excluding Maoris).	Year.	Number of Marriages.	Mean Population (excluding Maoris).
1882	3,600	509,309	1893	4,115	661,349
1883	3,612	529,292	1894	4,178	679,196
1884	3,800	552,590	1895	4,110	692,417
1885	3,813	573,362	1896	4,843	706,846
1886	3,488	582,117	1897	4,928	721,609
1887	3,563	596,374	1898	5,091	736,260
1888	3,617	605,371	1899	5,461	749,984
1889	3,632	612,716	1900	5,860	763,594
1890	3,797	620,780	1901	6,095	777,968
1891	3,805	629,783	1902	6,394	797,793
1892	4,002	642,245	1903	6,748	820,217

The average number of children to a marriage may be ascertained by comparing the number of legitimate births for a series of years with the marriages, but commencing with the marriages in the year preceding that for which the first number of births is taken.

The figures for the twenty-year period 1884–1903 show a decline in the proportion of births to every marriage in the preceding year from 5·33 to 3·26, as below :—

Year.	Marriages.	Legitimate Births.	Proportion of Births to every Marriage solemnised in the Preceding Year.
1883	3,614	..	..
1884	3,802	19,259	5·33
1885	3,815	19,062	5·01
1886	3,489	18,697	4·90
1887	3,565	18,518	5·31
1888	3,617	18,325	5·14
1889	3,632	17,845	4·93
1890	3,797	17,675	4·87
1891	3 805	17 635	4·64
1892	4,002	17,283	4·54
1893	..	17,514	4·37
1893	4,115	..	..
1894	4,178	17,824	4·33
1895	4,110	17,711	4·24
1896	4,843	17,778	4·32
1897	4,928	17,911	3·70
1898	5,091	18,154	3·68
1899	5,461	18,006	3·54
1900	5,860	18,640	3.41
1901	6,095	19,554	3·34
1902	6,394	19,734	3·23
1903	..	20,835	3·26

If the average result be taken out for the ten years, 1884–1893, it will be found to represent 4·90 births to a marriage. Dealing similarly with the figures for 1894–1903 the result is an average of 3·70, so that regarded annually or decennially there is a decided fall to be observed.

In the Australian States a similar decrease is noticeable.

New Zealand had in 1880 the highest birth-rate (40·78); in 1900 the case was reversed; but in 1903 the New Zealand rate was higher than that of Queensland, New South Wales, Victoria, and South Australia.

The fall over ten years is calculated as under :—

Birth-rates per 1,000 of Population.

State or Colony.	1893.	1894.	1895.	1896.	1897.	1898.	1899.	1900.	1901.	1902.	1903.
Queensland ..	33·73	31·86	32·85	30·06	29·92	28·28	27·31	30·21	28·28	27·68	24·71
New South Wales..	33·33	31·48	30·66	28·35	28·42	27·14	27·10	27·43	27·60	27·17	25·28
Victoria	31·23	29·16	28·56	27·33	26·59	25·72	26·71	25·82	25·77	25·23	24·46
South Australia ..	31·76	30·49	30·23	28·46	26·97	24·98	25·51	25·78	25·39	24·85	23.43
Western Australia .	34·22	28·27	26·30	22 65	25·82	29·35	30·64	31·46	30·32	30·09	30·27
Tasmania ..	33·92	31·11	30·09	28·16	27·73	26·24	25·98	28·25	28·40	28·95	28.61
New Zealand ..	27·50	27·28	26·78	26·33	25·96	25·74	25·12	25·60	26·34	25·89	26·61

This table also shows that although New Zealand had in 1900 the lowest birth-rate in Australasia, the fall has been much less in this colony since 1893 than in the others.

A declining birth-rate is noticeable in many civilised countries, and attention has been drawn by statisticians and political economists to the serious consequences that may result. That fertility among women in New Zealand is decreasing, from whatever causes, further facts will tend to show.

Taking the number of married women in New Zealand at what may be considered the child-bearing ages (*i.e.*, from fifteen to forty-five years, inclusive) as shown by each census since 1878, and for the same years the number of legitimate births (excluding plural) registered, the birth-rate per 1,000 married women of the above-stated ages is easily found, and is shown to be steadily declining. In 1878 the rate was 337 per 1,000, in 1896 it had fallen to 252, and in 1901 to 244; or, in other words, in 1878 one married woman of the ages specified in every three gave birth to a child, while in 1901 the rate was one in four only. The figures for each census year are given below, and are followed by a table showing the declining birth-rate, and the increase in the marriage-rate, in the United Kingdom.

BIRTH-RATES (LEGITIMATE) PER 1,000 MARRIED WOMEN AT CHILD-BEARING AGES FOR EACH CENSUS YEAR, 1878 TO 1901.

Year (Census).	Number of Married Women between 15 and 45 Years of Age.	Number of Legitimate Births (Confinements).	Birth-rate per 1,000 Married Women of from 15 to 45 Years of Age.
1878	50,995	17,196	337·2
1881	57,458	18,003	313·3
1886	62,704	18,532	295·5
1891	63,165	17,455	276·3
1896	69,807	17,596	252·1
1901	79,406	19,355	243·8

BIRTH AND MARRIAGE RATES IN THE UNITED KINGDOM, 1887, 1891, 1896, 1901, AND 1902.

Year.	Mean Population.	Births. Number.	Births. Rate per 1,000 of Population.	Marriages. Number.	Marriages. Rate per 1,000 of Population.
1887 ..	36,599,143	1,123,149	30·69	246,339	6·73
1891 ..	37,806,773	1,148,259	30·37	275,970	7·30
1896 ..	39,644,147	1,152,144	29·06	296,089	7·47
1901 ..	41,546,698	1,162,414	27·98	312,532	7·52
1902 ..	42,166,884	1,177,149	27·92	315,648	7·49

The above figures are taken from the "Statistical Abstract for the United Kingdom" (50th number), published in August, 1903.

The birth-rates for ten years in Great Britain and certain countries of the European Continent are given from the report of the Registrar-General of England. The rates in England and Wales, and in Scotland, are higher than those in New Zealand, but the rate for Ireland is lower. For 1892 and following years France has the lowest rate of all quoted:—

BIRTH-RATES IN EUROPEAN COUNTRIES, 1892 TO 1901.

Countries.	Number of Births per 1,000 of Mean Population.									
	1892.	1893.	1894.	1895.	1896.	1897.	1898.	1899.	1900.	1901.
Hungary ..	40·4	42·6	41·5	41·9	40·5	40·3	37·7	39·3	39·3	37·8
Austria ..	36·2	37·9	36·7	38·1	38·0	37·5	36·2	37·1	..	36·9
Italy ..	36·1	36·4	35·4	34·7	34·7	34·6	33·4	33·8	32·9	32·6
German Empire	35·7	36·8	35·9	36·1	36·3	36·0	36·1	35·8	35·6	35·7
Netherlands ..	32·0	33·8	32·7	32·8	32·7	32·5	31·9	32·0	31·5	32·3
Scotland ..	30·7	30·8	29·9	30·0	30·4	30·0	30·1	29·8	29·6	29·5
Norway ..	29·6	30·7	29·8	30·6	30·4	30·0	30·3	30·9	30·1	29·8
England and Wales	30·4	30·7	29·6	30·2	29·6	29·5	29·3	29·1	28·7	28·5
Belgium ..	28·9	29·5	29·0	28·5	29·0	29·0	28·6	28·8	28·9	29·4
Sweden ..	27·0	27·4	27·1	27·5	27·2	26·7	27·1	26·4	26·9	26·8
Switzerland ..	27·4	27·7	27·1	27·1	27·9	28·1	28·4	28·9	28·6	29·1
Ireland ..	22·5	23·0	22·9	23·2	23·6	23·5	23·2	22·9	22·7	22·7
France ..	22·3	22·7	22·3	21·7	22·5	22·3	21·8	21·9	21·4	22·0

From the year 1895 marriages have shown an increase, the rate being then 5·94 per 1,000 of population. In 1903 the rate rose to 8·23, the highest record since 1876, when it was 8·25 per 1,000 of mean population. The number of marriages solemnised in 1903 was 6,748, an increase of 354 on the number for 1902.

MARRIAGE-RATES IN AUSTRALASIA PER 1,000 OF POPULATION FOR FIVE YEARS.

	1899.	1900.	1901.	1902.	1903.
Queensland	6·78	6·88	6·61	6·31	5·72
New South Wales ..	6·89	7·38	7·68	7·53	6·86
Victoria	7·01	6·96	6·99	7·02	6·29
South Australia	6·24	6·50	6·44	6·61	6·25
Western Australia ..	9·89	10·27	9·65	9·77	9·33
Tasmania	6·37	7·71	7·68	7·47	7·57
New Zealand	7·28	7·67	7·83	8·01	8·23

In April, 1896, New Zealand had 83,659 children living under the age of five years, and in March, 1901, the number was 86,806, an increase of 3,147, although the population at all ages increased in the quinquennium by 9·86 per cent. Between 1886 and 1891 the children living under five years actually decreased in number by 3,624, the increase of population of all ages (8·33 per cent.) being less than between 1891 and 1896 (12·24 per cent.), or 1896 and 1901 (9·86 per cent.). The number of children under one year to the total population at all ages, according to the results of four censuses, was :—

	Children under One Year.	Total Population (all Ages).
Census 1886	18,355	578,482
" 1891	16,443	626,658
" 1896	17,070	703,360
" 1901	18,381	772,719

Thus, in 1886, with a population of 578,482 persons, there were 18,355 children under one year, against 18,381 children of that age in 1901, with a population of 772,719 persons.

The births registered in 1885 were 19,693, against 19,546 in 1900. The birth-rate fell from 34·35 per 1,000 of the population in 1885 to 25·60 in 1900.

Deducting 1,469, the number of deaths of children under one year registered in 1900, from 19,546, the number of births for that year, leaves 18,077, or within 304 of the living children under one year at the time of the last census.

Twin Births.

There were 222 cases of twin births (444 children), and triplets were registered in one instance, in 1903. The number of children born was 21,829; the number of mothers was 21,605: thus, on an average, one mother in every 97 gave birth to twins, against 93 in 1902, and 107 in 1901.

Illegitimacy.

The births of 994 children were illegitimate: thus 46 in every 1,000 children born were born out of wedlock, against 45 in 1902.

The following table gives the rates of illegitimacy in Australasia. The rate in 1903 in New Zealand was less than in any of the Australian States except South Australia:—

Proportion of Illegitimate Births in every 100 Births.

Year.	Queensland.	New South Wales.	Victoria.	South Australia.	Western Australia.	Tasmania.	New Zealand.
1893	4·97	6·16	5·46	2·84	4·17	4·41	3·70
1894	4·52	6·14	5·50	3·05	4·66	5·09	3·80
1895	4·93	6·51	5·33	3·13	4·47	4·97	4·50
1896	5·22	5·71	5 63	3·45	5·61	5·91	4·48
1897	6·02	6·58	5·42	3·53	5·27	5·74	4·41
1898	6·04	6·93	5·29	3·62	4·99	5·09	4·23
1899	5·97	7·15	5·49	3·95	4·91	6·08	4·40
1900	6·40	7·01	5·91	4·24	4·82	5·43	4·63
1901	5·93	7·16	5·58	3·98	3·88	5·94	4·57
1902	6·04	6·60	5·51	4·36	3·96	5·36	4·46
1903	6·76	6·71	..	4·18	4·69	5·61	4·55

These figures show a rise in the proportion of illegitimate births to every 100 births for this colony, amounting to 0·85 for the period 1893–1903.

The total number of births registered was 19,299 in 1886 and 21,829 in 1903, while the illegitimate births rose from 602 to 994. The causes that led to the fall in the birth-rate certainly did not greatly affect the number of illegitimate children.

The number of spinsters in the colony between 15 and 45 increased during the ten years from 65,035 (census 1891) to 100,310 (census 1901), or at the rate of 55·9 per cent., while the illegitimate births increased from 638 to 937, or at the rate of 46·9 per cent. only.

It would therefore appear that the larger proportion of illegitimate births now obtaining cannot with any certainty be taken as indicative of increased looseness of living on the part of the people.

The following figures, showing the rate of illegitimacy per 100 births in Australasia and in the United Kingdom, are based on statistics for a period of five years :—

Country.	Illegitimate Births per Cent.	Country.	Illegitimate Births per Cent.
New South Wales ..	6·9	Tasmania	5·7
Victoria	5·6	New Zealand	4·4
Queensland	6·0	England and Wales ..	4·2
South Australia ..	4·0	Ireland	2·6
Western Australia ..	4·5	Scotland	7·2

Of the total number of children born in Australasia during the five years ended 1901, 5·75 per cent. were illegitimate, as compared with 4·42 per cent. in the United Kingdom for the period 1896–1900.

The figures in the next table, which give the percentages of illegitimate births in a number of foreign countries, also cover in most cases a period of five years, 1897–1901.

Country.	Illegitimate Births per Cent.	Country.	Illegitimate Births per Cent.
Germany	9·08	France	8·82
Prussia	7·68	Belgium	7·67
Bavaria	13·43	Netherlands	2·60
Saxony	12·89	Sweden	11·13
Austria	14·20	Norway	7·43
Hungary	9·13	Italy	6·45

For England and Wales the proportion of illegitimate births to the total births in 1900 was 4 per cent., having gradually diminished from 7 per cent. in 1845. The minimum rate was 2·7 per cent., in Essex, and the maximum 6·7 per cent., in Westmoreland. For London the percentage was 3·6.

The average proportion of illegitimate births in Scotland in 1901 was 6·3 per cent., the rate varying from 3·4 per cent. in Dumbartonshire to 13·7 in Wigtownshire; but in Ireland in that year the extremely low average of 2·6 per cent. obtained, the rate varying rom 0·7 in Connaught to 3·4 in Ulster.

The Legitimation Act.

An important Act was passed in 1894, entitled the Legitimation Act, which makes provision for the legitimation of children born before marriage on the subsequent marriage of their parents. Under this Act any child born out of wedlock, whose parents afterwards marry, is deemed to be legitimised by such marriage on the birth being registered in the manner prescribed by the Act. For legitimation purposes Registrars must register a birth when called upon to do so by any person claiming to be the father of an illegitimate child; but such person is required to make a solemn declaration that he is the father, and that at the time of the birth there existed no legal impediment to his marriage with the mother of the child. He has also to produce the evidence of his marriage. It will thus be seen that in cases dealt with under the Act registration becomes the test of legitimacy. In the December quarter of 1894, 11 children were legitimised; in 1895 the number was 68; in 1896, 56; in 1897, 48; in 1898, 59; in 1899, 41; in 1900, 62; in 1901, 47; in 1902, 96; and in 1903, 65; making altogether 553 legitimations since the passing of the law.

"The Infant Life Protection Act, 1896."

By this statute it has been rendered unlawful for a person to take charge, for payment, of an infant to maintain or nurse for more than three days without holding a license as an infants' home keeper. The house of such a person must be registered as an infants' home.

The administration of this law is a matter entirely managed by the police. The licensed homes are periodically inspected, and the results have shown that licensees generally comply with the required conditions, the homes and infants being well looked after.

The Commissioner in his report for the year ended 31st March, 1903, writes:—

> During the year 1902 there were 583 registered homes throughout the colony, representing 936 infants, against 565 homes and 943 infants in 1901.
>
> Forty-four deaths occurred in the homes during the year, against twenty-nine in the preceding year, being equal to 47 per thousand, against 30·75 per thousand in 1901. This increased mortality is due to scarlet fever and measles.
>
> The mortality throughout the colony of infants under four years of age (the age to which the Act applies) rose from 26·37 per thousand in 1901 to 31·11 in 1902. The mortality in the homes will always considerably exceed the general mortality of the colony, for the reason I have stated in previous reports.
>
> Eighteen licensees were prosecuted for breaches of the Act during the year, of whom twelve were convicted, against eleven prosecutions and ten convictions in 1901, and one license was cancelled.

Births and Birth-rates in the Four Chief Cities.

The total number of births registered as occurring in the four chief centres and suburbs in 1903 was 5,812, as against 5,347 for the previous year.

There is increase in the births for the four chief cities and decrease for suburban boroughs found on comparison with figures for

1902, but the rise in the cities and fall in the smaller boroughs is caused by the absorption of Melrose in Wellington, and that of Linwood, St. Albans, and Sydenham in Christchurch. The birth-rates for 1902 were :—

	Birth-rates per 1,000 of Mean Population.	
Auckland City	31·67	
" and five suburban boroughs ..	..	30·09
Wellington City	29·22	
" and two suburban boroughs ..	..	28·63
Christchurch City	26·59	
" and one suburban borough ..	..	26·76
Dunedin City	19·54	
" and eight suburban boroughs ..	..	22·79

By the inclusion of the suburbs the rate is raised at Christchurch and Dunedin, but lowered at Auckland and Wellington. It will be observed that Auckland has the highest rate, Wellington next highest, Christchurch and Dunedin following with intervals. The difference between the Auckland rate (30·09) and the Dunedin rate (22·79) is considerable. The birth-rate for the whole colony last year was 26·61 per thousand. Auckland, Christchurch, and Wellington are thus over the average, and Dunedin below it.

The birth-rates for three of the central boroughs last year show a rise when compared with 1902. In Auckland the rate rose from 30·80 to 31·67, in Christchurch from 25·84 to 26·59, in Wellington from 25·29 to 29·22; but fell in Dunedin from 19·96 to 19·54. The rates for five years, 1899 to 1903, are :—

	Births per 1,000 of Population.				
	1899.	1900.	1901.	1902.	1903.
Auckland (without suburbs) ..	25·77	29·31	30·00	30·80	31·67
Wellington " ..	24·24	25·76	26·35	25·29	29·22
Christchurch " ..	18·74	21·51	24·12	25·84	26·59
Dunedin " ..	20·82	22·07	22·04	19·96	19·54

Naturalisation.

Aliens residing in the colony may, on taking the oath of allegiance to His Majesty, obtain letters of naturalisation entitling them to enjoy all the rights and privileges that a natural-born subject of the United Kingdom can enjoy or transmit within this colony. Two hundred and seventy-six aliens (265 men and 11 women) were naturalised in 1903.

The number belonging to each nationality was as under :—

Number of Aliens naturalised in 1903.

Natives of—	M.	F.	Natives of—	M.	F.
German Empire	34	5	United States of America	4	0
Norway and Sweden ..	33	0	Netherlands	5	0
Denmark	20	3	Switzerland	5	0
Russia, Poland, and Finland	14	0	Belgium	2	0
France and possessions ..	4	1	Portugal and possessions ..	5	0
Italy	15	1	Turkey and Syria ..	3	0
Austria-Hungary ..	116	1	Spain	1	0
China	3	0	Roumania	1	0

The number of natives of each country naturalised during the last twenty-one years is next shown.

Natives of—		Natives of—	
Germany	1,534	Netherlands	58
Sweden and Norway ..	1,148	Greece	45
Denmark	816	Portugal	58
China	329	United States of America ..	75
Italy and Sicily	210	Belgium	30
Switzerland	168	Other countries	93
Russia in Europe ..	227		
Austria-Hungary	342	Total	5,262
France	129		

By section 2 of "The Aliens Act Amendment Act, 1882," repealed and re-enacted by section 2 of "The Aliens Act Amendment Act, 1892," it is provided that when the father, or mother being a widow, has obtained naturalisation in the colony, every child who during infancy has become resident with them in New Zealand shall be deemed to be naturalised, and shall have the rights and privileges of a natural-born subject.

Marriages.

The marriages for 1903 show an increase on the number for the previous year. The number was 6,748, or 354 more than in 1902. The marriage-rate rose from 8·01 per 1,000 persons living in 1902 to 8·23 in 1903, the rate for the latter year being the highest obtained since 1876, when it stood at 8·25 per 1,000 persons. The improvement shown during the last eight years sets New Zealand in a good position relatively to the Australian States.

The rates for a series of fifteen consecutive years were:—

Marriages per 1,000 of the Population.

Year.	Queensland.	New South Wales.	Victoria.	South Australia.	Western Australia.	Tasmania.	New Zealand.
1889 ..	8·37	6·76	8·14	6·47	6·99	6·50	5·94
1890 ..	8·49	7·14	8·21	7·06	5·80	6·64	6·12
1891 ..	7·18	7·39	7·69	7·31	8·00	6·63	6·04
1892 ..	6·67	6·77	6·64	6·51	7·29	6·51	6·23
1893 ..	5·91	6·40	5·99	6·26	6·34	5·51	6·22
1894 ..	5·70	6·20	5·98	6·09	6·24	5·43	6·15
1895 ..	6·23	6·35	6·00	5·88	6·83	5·32	5·94
1896 ..	6·05	6·59	6·48	6·20	8·45	5·88	6·85
1897 ..	6·05	6·72	6·36	5·46	10·73	6·23	6·83
1898 ..	6·03	6·66	6·53	6·18	9·89	6·29	6·91
1899 ..	6·78	6·89	7·01	6·24	9·89	6·37	7·28
1900 ..	6·88	7·38	6·96	6·50	10·27	7·71	7·67
1901 ..	6·61	7·68	6·99	6·44	9·65	7·68	7·83
1902 ..	6·31	7·53	7·02	6·61	9·77	7·47	8·01
1903 ..	5·72	6·86	6·29	6·25	9·33	7·57	8·23

But the improved rate for this colony is still lower than the rate for some few European countries.

MARRIAGES IN EVERY 1,000 OF THE POPULATION.

German Empire	1901 ..	8·2
Belgium	1901 ..	8·4
Hungary	1901 ..	8·8
England and Wales	1901 ..	7·95
Switzerland	1901 ..	7·6
Austria	1901 ..	8·1
Spain	1900 ..	8·9
Denmark	1901 ..	7·2
Scotland	1901 ..	7·1
France	1901 ..	7·8
Netherlands	1901 ..	7·7
Italy	1901 ..	7·2
Norway	1901 ..	6·7
Sweden	1901 ..	6·0
Ireland	1901 ..	5·1

Of the marriages solemnised in 1903, 6,133 were between bachelors and spinsters, 198 between bachelors and widows, 305 between widowers and spinsters, and 112 between widowers and widows.

Divorced men and women have been classified as bachelors or spinsters: 34 divorced men and 52 divorced women were married during the year.

Included amongst spinsters are six married women, and amongst the bachelors three married men, who elected to go through the form of marriage with other persons under the protection of the provisions of section 204, subsection (5), of "The Criminal Code Act, 1893," which runs: "No one commits bigamy by going through a form of marriage if he or she has been continually absent from his or her wife or husband for seven years then last past, and is not proved to have known that his wife or her husband was alive at any time during those seven years."

The total number of marriages solemnized (6,748) does not include marriages where both parties are of the aboriginal native race, such persons being exempted from the necessity of complying with the provisions of the Marriage Act, although at liberty to take advantage thereof. Sixteen marriages in which both parties were Maoris were contracted in 1903 in terms of the Act: 9 by Registrars, 6 by clergymen of the Church of England, and 1 by a Roman Catholic minister.

BACHELORS AND SPINSTERS IN NEW ZEALAND.

The results of three censuses in respect of the number of bachelors of 20 years and upwards, and spinsters of 15 years and upwards, in the colony show some interesting features. In 1891

there was an excess of bachelors over the spinsters amounting to 3,497 men. But by 1896 not only had the preponderance of the male element been lost, but an excess of spinsters over bachelors was reported amounting to 1,786 women, while in 1901 this excess had risen to 3,572 women.

It is noticeable how differently the numbers for the provincial districts have been affected by the process in operation. An excess of bachelors was preserved in Auckland, Taranaki, Hawke's Bay, Wellington, Marlborough, Nelson, and Westland from 1891 to 1901. In Canterbury, however, an excess of spinsters was found in 1891 of 2,516, which increased to 3,997 in 1896 and to 4,918 in 1901; while in Otago an excess of 773 spinsters in 1891 increased to 2,066 in 1896, and diminished slightly in 1901, when there were 1,899 more spinsters than bachelors. These two important districts of the Middle Island have lost large numbers of bachelors by departures to the North Island. The following table exhibits the particulars for each provincial district:—

Provincial Districts.	Census, 1891.		Census, 1896.		Census, 1901.	
	Excess of Bachelors over Spinsters.	Excess of Spinsters over Bachelors.	Excess of Bachelors over Spinsters.	Excess of Spinsters over Bachelors.	Excess of Bachelors over Spinsters.	Excess of Spinsters over Bachelors.
Total excess ..	3,497	..	..	1,786	..	3,572
Auckland ..	156	..	703	..	521	..
Taranaki ..	121	..	524	..	805	..
Hawke's Bay ..	1,337	..	1,142	..	425	..
Wellington ..	2,129	..	637	..	32	..
Marlborough ..	644	..	183	..	158	..
Nelson	1,486	..	580	..	637	..
Westland ..	900	..	501	..	666	..
Canterbury ..	..	2,516	..	3,997	..	4,918
Otago	..	773	..	2,066	..	1,899
Chatham Islands	15	..	7	..	1	..
Kermadec Islands	..	2	..	..	..	..

Marriages by Ministers of various Denominations.

Of the marriages in the year 1903, 25·52 per cent. were solemnised by ministers of the Church of England, 25·31 per cent. by ministers of the Presbyterian Churches, 13·32 per cent. by ministers of the Wesleyan and other Methodist Churches, 10·08 per cent. by ministers of the Roman Catholic Church, 9·87 per cent. by ministers of other denominations, and 15·90 per cent. by Registrars.

The following shows the proportions of marriages by ministers of the principal denominations in the past eight years, and the percentages of these denominations to the total population in 1901:—

Denomination.	Percentage of Marriages.								Percentage of Denomination to Total Population in 1901.
	1896.	1897.	1898.	1899.	1900.	1901.	1902.	1903.	
Church of England	22·86	23·00	23·37	24·17	22·68	24·91	24·58	25·52	40·84
Presbyterians ..	25·01	25·44	26·02	25·30	26·38	24·48	25·95	25·31	22·87
Methodists ..	17·92	17·61	13·98	12·91	13·23	13·19	12·95	13·32	10·86
Roman Catholics ..	10·26	10·12	10·37	10·87	10·82	10·53	9·94	10·08	14·23
Other denominations	6·05	5·86	9·25	9·34	10·20	10·20	10·07	9·87	11·20
By Registrars ..	17·90	17·97	17·01	17·41	16·69	16·69	16·51	15·90	..
	100·00	100·00	100·00	100·00	100·00	100·00	100·00	100·00	100·00

Marriage by the Registrar is found to be less frequent than it was eight years ago, the percentage falling from 17·90 in 1896 to 15·90 in 1903.

Marriage Register signed by Mark.

Of the men married in 1903, 26, or 3·85 in every 1,000, and of the women 42, or 6·22 per 1,000, signed the register by marks.

The illiteracy of the people, as measured by the proportion of married persons who affix marks instead of signatures to the marriage register, has greatly decreased of late, having fallen since 1881 from 32·04 per 1,000 among men to 3·85 per 1,000, and from 57·98 per 1,000 to 6·22 per 1,000 among women. This is shown in a very striking manner by the following table:—

Persons in every 1,000 married who signed by Mark.

Denomination.	1881.		1891.		1901.		1903.	
	M.	F.	M.	F.	M.	F.	M.	F.
Church of England ..	16·59	27·15	8·29	10·66	1·32	3·29	0·58	2·94
Presbyterians ..	10·25	29·61	5·79	8·69	2·68	4·69	0·59	1·76
Wesleyans and other Methodists	32·41	41·79	8·93	10·71	3·73	3·73	2·22	2·22
Roman Catholics ..	117·78	133·33	31·33	18·28	6·23	7·79	5·88	7·35
Other denominations	10·36	20·72	9·26	..	1·61	3·22	3·00	6·01
By Registrars ..	39·22	93·51	27·42	43·08	13·77	15·73	14·91	21·44
Total marriages	32·04	57·98	13·93	16·82	4·59	6·23	3·85	6·22

The proportion of illiterates in 1901 and 1903 was greatest among those married before Registrars. Previously the proportion was largest among Roman Catholics; but since 1881 it has, as shown by the table, most remarkably decreased.

Ages of Persons married.

Of the persons married in 1903, 109 bridegrooms and 1,080 brides were under 21 years of age—one of the bridegrooms was

between 17 and 18, and five between 18 and 19. Of the brides, one was under 15 years of age, eight were between 15 and 16, and twenty-three between 16 and 17 years of age. The proportion of men married is greatest at the ages of 25 to 30, and of women at from 21 to 25 years.

The following are the proportions of men and women married at each age-period to every 100 marriages in the years 1891, 1901, and 1903:—

Age.	1891.		1901.		1903.	
	M.	F.	M.	F.	M.	F.
Under 21 years	1·55	20·79	1·93	17·16	1·62	16·01
21 and under 25	26·99	43 99	24·94	39·97	24·48	39·67
25 „ 30	36·19	22·97	37·08	26·89	38·22	28·14
30 „ 40	25·94	8·72	27·12	12·73	27·00	12·52
40 „ 50	6 44	2·71	6·04	2·44	5·45	2·59
50 „ 60	2·26	0·66	1·77	0·57	1·94	0·68
60 „ 70	0·55	0·16	0·92	0·24	0·90	0·33
70 and upwards	0·08	..	0·20	..	0·39	0·06

Registrars of Marriages are prohibited by law from issuing certificates for the marriage of minors without the consent of their parents or lawful guardians, if there be any in the colony. If a declaration be made in any case that there is no parent or lawful guardian in the colony, then a certificate may be issued after the expiration of fourteen days following the date on which the notice of intended marriage is given.

A marriage may not be solemnised except after the delivery to the minister or Registrar who officiates of a certificate issued by a Registrar authorising such marriage, and if any persons knowingly and wilfully intermarry without such certificate the marriage is null and void; and no clergyman or minister of any denomination is empowered to solemnise marriages until his name has been placed on the Registrar-General's list of officiating ministers for the year.

Marriage with a deceased wife's sister in New Zealand was legalised in the year 1880, and an Act was passed in the year 1900 which legalised marriage with the brother of a deceased husband. This Act is retrospective, including in its provisions marriages between such parties which had previously been solemnised as well as those contracted after the statute was passed, and declaring all these to be valid, and the issue born prior or subsequent to the passing of the Act to be deemed born in lawful wedlock.

The measure was reserved for the signification of her late Majesty's pleasure. The Royal assent has since been given, and the Act came into force in New Zealand by Proclamation dated the 22nd May, 1901.

The ages at which persons may contract binding marriages are the same as in England—12 years for females and 14 for

males. Marriage may be contracted at earlier ages than those stated, but would be voidable at the discretion of either of the parties upon reaching the age of 12 or 14, as the case may be, and without the necessity of proceedings in Court.

Although in New Zealand the age at which girls may legally marry is as above, nevertheless, by the criminal law, to unlawfully carnally know a girl under the age of 16 years is now a punishable offence. The age of consent was raised from 15 to 16 by statute passed in 1896.

The average age of the men married in this colony in 1903 was 29·89 years, and of the women 25·84 years. In England the mean age of those whose ages were stated was (in the year 1900) 28·41 years for men, and 26·29 years for women. Thus the average age at marriage in the colony would appear to be higher for men, but lower for women, than in England.

The proportion of bridegrooms under 21 is much greater in England than in New Zealand; but the proportion of brides under 21 in the colony is about the same.

In England, in 1900, of every 1,000 bridegrooms whose ages were stated, 51 were under 21 years of age, and of every 1,000 brides 163 were under 21 years of age. In New Zealand, in 1903, the proportions were 16 bridegrooms and 160 brides of similar ages in every 1,000 married :—

Year.	Bridegrooms under 21 in every 100.	Brides under 21 in every 100.	Year.	Bridegrooms under 21 in every 100	Brides under 21 in every 100.
1890	1·89	22·75	1899	2·10	18·81
1892	1·62	20·14	1900	1·67	17·34
1894	1·44	19·53	1901	1·93	17·16
1896	1·96	19·51	1902	1·39	16·59
1898	1·57	18·13	1903	1·62	16·01

Number of Ministers.

The number of names on the list of officiating ministers under the Marriage Act is (April, 1904) 1,092, and the denominations to which they belong are shown hereunder :—

Denomination.	No.	Denomination.	No.
Church of England	336	Auckland Society of the New Jerusalem Church	1
Presbyterian Church of New Zealand	243	Auckland Central Mission	1
Roman Catholic Church	177	Wellington Central Mission	1
Methodist Church of Australasia in New Zealand	167	Independent Free Church	1
Congregational Independents	22	Salvation Army	18
Baptists	35	Catholic Apostolic Church	4
Primitive Methodist Connexion	41	Seventh-day Adventists	5
Lutheran Church	8	Unitarians	1
Hebrew Congregations	6	Pilgrims of Peace	1
Church of Christ	16	Scots Church	1
Free Methodist Church of New Zealand	3	Brethren	2
		Latter Day Saints	2
		Total	1,092

Deaths.

The deaths in 1903 numbered 8,528, being equivalent to a rate of 10·40 in every 1,000 persons living, as against 10·50 in 1902. The lowest rate experienced since the year 1887, when the deaths were 10·29 per 1,000 of the population, was that for 1896 (9·10).

Comparative Death-rate for the Period 1893 to 1903.

Country.	1893.	1894.	1895.	1896.	1897.	1898.	1899.	1900.	1901.	1902.	1903.
New Zealand ..	10·23	10·19	9·91	9·10	9·14	9·84	10·24	9·43	9·81	10·50	10·40
Queensland ..	13·34	12·08	11·38	12·10	11·33	12·66	12·07	11·73	11·88	12·08	12·38
New South Wales	13·24	12·36	11·79	12·30	10·88	12·48	11·82	11 16	11·68	11·95	11·59
Victoria ..	14·11	13·14	13·25	13·35	12·90	15·94	14·28	12·75	13·22	13·40	12·90
South Australia* ..	13·44	11·64	11·25	11·48	11·24	13·06	12·14	10·64	11·11	11·79	10·71
Western Australia	15·31	14·40	17·78	16·45	16·97	16·05	13·76	12·92	13·36	13·63	12 60
Tasmania ..	13·47	12·42	11·38	11·63	11·53	13·51	12·25	11·05	10·45	10·84	11·92
England and Wales	19·1	16·5	18·7	17·0	17·4	17·5	18·2	18 2	16·9	..	..
Scotland ..	19·3	17·1	19·4	16·6	18·4	18·0	18·1	18·5	18·0	..	..
Ireland	17·9	18·2	18·4	16·6	18·4	18·1	17·6	19·6	17·8	..	..
Denmark ..	18·8	17·4	16·8	15·6	16·5	15·5	17·3	16·9	15·8	..	..
Norway	16·3	16·9	15·7	15·2	15·3	15·3	16·9	15·9	14·9	..	..
Sweden	16·8	16·4	15·2	15·6	15·4	15·1	17·7	16·8	16·0	..	..
Austria	27·2	27·8	27·7	26·4	25·6	24·9	25·4	25·2	24·0	..	..
Hungary ..	31·2	30·5	29·7	28·9	28·5	28·0	27·2	26·9	25·4	..	..
Switzerland ..	19·9	19·9	19·1	17·7	17·6	18·2	17·6	19 3	18·0	..	..
German Empire ..	24·6	22·3	22·1	20 8	21·3	20·5	21·5	22·1	20·7	..	..
Netherlands ..	19·2	18·5	18·6	17·2	16·9	17·0	17·1	17·8	17·2	..	..
France	22·5	21·2	22·2	20·0	19·5	20·9	21·1	21·9	20·1	..	..
Italy	25·1	24·9	25·0	24·0	21·9	22·9	21·8	23·8	21·9	..	..

* Excluding the Northern Territory.

As will be seen from the preceding table, covering a series of years, the death-rate in New Zealand contrasts very favourably with that in the Australian States and in European countries.

In this statement New Zealand is conspicuous as showing the lowest death-rate. The rates for the principal Australian States are a little higher, but, generally speaking, far below those for the United Kingdom or the European Continental States mentioned in the table.

Perfect accuracy in comparing one country or colony with another can only be attained by the use of what is termed an "index of mortality." The proportions of the living vary in regard to the different age-groups, and the ordinary death-rate—which is calculated on the population as a whole—does not afford a true means of judging of the relative healthiness of the places compared. But by taking a population like that of Sweden, and applying the percentage at each age-group to the death-rates, a standard of health or index of mortality can be arrived at. This has been done for New Zealand, in accordance with a resolution of the Statistical Conference held at Hobart in 1902, and the result is expressed in tabular form. When similar results are published by the States of Australia, comparisons will be given.

INDEX OF MORTALITY IN NEW ZEALAND FOR 1903.

Ages.	Estimated Mean Population, 1903.	Number of Deaths, 1903.	Death-rate per 1,000, 1903.	Percentage of Population of Sweden, 1890 (Standard).	Index of Mortality in New Zealand per 1,000.
Under 1 year ..	19,521	1,770	90·67	2·55	2·31
1 and under 20 years	344,327	1,187	3·45	39·80	1·37
20 and under 40 years	270,097	1,369	5·07	26·96	1·37
40 and under 60 years	130,825	1,440	11·01	19·23	2·12
60 years and upwards	55,447	2,762	49·81	11·46	5·71
Totals ..	820,217	8,528	10·40	100·00	12·88

DEATHS AND DEATH-RATES OF THE FOUR PRINCIPAL CITIES AND THEIR SUBURBS.

In the earlier annual reports on the vital statistics of the four chief towns the central boroughs alone were dealt with, particulars respecting the suburbs not having been obtained. But this omission was held to be a grave defect, as the suburban death-rate may differ much from the death-rate at the centre. Steps were therefore taken early in 1895 to collect statistics of the suburban boroughs as well as of the four chief cities. As regards Auckland and Christchurch, the whole of the area usually recognised as suburban has not yet been brought under municipal government, and the statistics given below do not deal with such portions as still remain in road districts. The omission, however, is not very important, for there are in either case quite enough suburbs included within borough boundaries to give a fair idea of the death-rate of greater Auckland and greater Christchurch. As further boroughs are formed the vital statistics will be made to include them.

The total number of deaths registered for the four centres in 1903 was 2,524—viz., 1,964 in the cities, and 560 in the suburbs.

By including the suburbs the death-rate for last year is lowered at each of the four centres. The rates for the year are:—

	Death-rates per 1,000 of Mean Population.
Auckland City	12·97
" and five suburban boroughs ..	12·23
Wellington City	11·30
" and two suburban boroughs ..	10·93
Christchurch City	11·39
" and one suburban borough ..	11·29
Dunedin City	14·77
" and eight suburban boroughs ..	12·47

MORTALITY AT FOUR CENTRES, INCLUDING SUBURBS.

If the suburbs are included, the death-rate is found to be highest in Dunedin and lowest in Wellington; Auckland and Christchurch taking second and third places respectively. The death-rate for the colony was 10·40 per 1,000 of mean population. The four centres might be expected to show a higher average than this.

If the number of deaths of infants under one year be excluded. the mortality among the rest of the population is found to have been for 1902 and 1903 in the following ratio to the 1,000 living :—

	1902.	1903.
Auckland (including suburbs)	11·10	8·57
Wellington „	8·87	8·27
Christchurch „	9·04	8·60
Dunedin „	9·23	11·11

The degree of infantile mortality is perhaps best shown in the proportion of deaths of children under one year of age to every 100 births. For 1902 and 1903 the proportions at the chief centres were,—

	1902.	1903.
Auckland (including suburbs)	14·07	12·15
Wellington „	13·02	9·27
Christchurch „	11·76	10·05
Dunedin „	8·91	6·23

Thus in 1903 the proportions for Dunedin and Wellington are less than those found at either of the other two chief cities.

Mortality at Four Centres, excluding Suburbs.

The comparison of rates that follow for the towns, excluding suburbs, are all given subject to the fact that Wellington figures for 1903 have been increased by the inclusion of what was formerly the Borough of Melrose, and those for Christchurch by the mortality in the former Boroughs of Linwood, St. Albans, and Sydenham.

Excluding suburbs, and dealing with the deaths at all ages in the four cities or central boroughs only, the rates for 1903 are found to be higher in Dunedin, but lower in Auckland, Wellington, and Christchurch than in the previous year. The figures for four years are given :—

Cities (excluding Suburbs).	Deaths, 1900.	Deaths, 1901.	Deaths, 1902.	Deaths, 1903.
	Per 1,000 of Population.	Per 1,000 of Population.	Per 1,000 of Population.	Per 1,000 of Population.
Auckland ..	13·69	13·10	17·21	12·97
Wellington ..	9·17	10·66	12·58	11·30
Christchurch ..	10·62	13·11	12·24	11·39
Dunedin ..	12·25	12·64	11·86	14·77

By omitting the deaths of infants under one year, and calculating the rate on the population of one year of age and upwards, the death-rate for Dunedin is still found to be higher in 1903 than in the previous year, but lower at the other three cities.

	Deaths per 1,000 of Population, excluding Infants (under One Year of Age).			
	1900.	1901.	1902.	903.
Auckland (excluding suburbs) ..	9·72	9·93	12·86	9·45
Wellington „ ..	7·65	8·12	9·54	8.84
Christchurch „ ..	8·22	10·69	9·03	8·83
Dunedin „ ..	10·64	10·88	10·35	13·61

Subjoined is a table showing the rates of infant mortality in the four cities for each of the past five years, together with the mean rates for the period.

	Deaths of Children under One Year to every 100 Births.					
	1899.	1900.	1901.	1902.	1903.	Mean of Five Years.
Auckland (excluding suburbs) ..	14·47	14·49	11·57	15·40	12·08	13·60
Wellington „ ..	12·26	6·65	10·43	12·97	9·28	10·32
Christchurch „ ..	19·71	11·99	11·35	13·32	10·49	13·37
Dunedin „ ..	10·20	8·37	9·07	8·60	7·27	8·70

Causes of Death at Four Centres, including Suburbs.

While treating of the death-rates at the chief cities and surroundings, it is desirable to refer to the causes of mortality, which is done in the remarks that follow. The deaths for the whole colony, classified according to their cause, are treated of at length a little further on.

Specific Febrile and Zymotic Diseases (at Four Chief Centres).

The mortality from these diseases at Christchurch and Dunedin, with their suburbs, was higher in 1903 than in the previous year, but for Auckland and Wellington much lower. The total deaths in this class were 256 for 1903, and 356 for 1902 at the four centres.

	Deaths from Febrile and Zymotic Diseases.				
	Auckland and Suburbs.	Wellington and Suburbs.	Christchurch and Suburbs.	Dunedin and Suburbs.	Total
1902 ..	165 ..	108 ..	48 ..	35 ..	356
1903 ..	86 ..	52 ..	58 ..	60 ..	256

Of the above, diarrhœal diseases caused most deaths in 1903 at the four centres taken together, the total number being 78. Scarlet fever came next, with 50 deaths, whooping-cough 29, measles 28, typhoid fever 16, influenza 15, diphtheria 5, and other zymotic complaints 35.

Comparison of the deaths for each city shows,—

Zymotic, &c., Diseases.	Auckland and Suburbs.		Wellington and Suburbs.		Christchurch and Suburbs.		Dunedin and Suburbs.	
	1902.	1903.	1902.	1903.	1902.	1903.	1902.	1903
Diarrhœal diseases ..	67	42	19	22	31	10	8	4
Influenza	10	4	9	2	3	2	7	7
Typhoid fever ..	10	8	3	5	2	2	2	1
Measles	40	6	49	3	..	17	3	2
Scarlet fever	1	2	1	6	5	12	4	30
Bubonic plague ..	3	..	..	..	..	..	..	..
Diphtheria	12	..	..	2	2	..	5	3
Whooping-cough ..	18	17	17	5	1	7	2	..
Other zymotic diseases	4	7	10	7	4	8	4	13

Parasitic Diseases (at Four Chief Centres).

Hydatids were fatal at Wellington and worms at Auckland (1 death each).

Dietetic Diseases (at Four Chief Centres).

These numbered 34, 7 being due to want of breast-milk, or malnutrition, 26 to alcoholism and delirium tremens, and 1 to starvation and exposure.

Constitutional Diseases (at Four Chief Centres).

The deaths at the four cities numbered 488 in 1903. The first in importance of these diseases, and of all causes of death, is tubercle. The figures for 1902 and 1903 show 254 and 250 deaths for each year respectively.

Phthisis and other Tubercular Diseases (at Four Chief Centres).

	1902.		1903.	
	Phthisis.	Other Tubercular Diseases.	Phthisis.	Other Tubercular Diseases.
Auckland and suburbs	42	11	38	24
Wellington "	49	19	46	12
Christchurch "	57	12	37	11
Dunedin "	44	20	53	29
	192	62	174	76

The mortality from tubercular diseases for 1903 is 9·90 per cent. of the total deaths at the four cities and their suburbs from all causes.

Deaths from cancer rose at the chief towns from 165 in 1902 to 179 in 1903. The latter number is 7·09 per cent. of deaths for the year from all causes.

The number of deaths from cancer at the four chief towns and their suburbs for each of the last five years was as under:—

	1899.	1900.	1901.	1902.	1903.
Auckland and suburbs	40	32	32	44	37
Wellington "	27	36	38	37	47
Christchurch "	40	32	41	25	33
Dunedin "	44	45	43	59	62
	151	145	154	165	179

Diabetes shows 25 deaths in 1903, against 26 in 1902.

Developmental Diseases (at Four Chief Centres).

There were 258 deaths in this class, of which 87 were from premature births, 151 from old age, and 20 from other causes.

Local Diseases (at Four Chief Centres).

Deaths in this class were 1 more than in 1902, the figures being 1,267, against 1,266. Diseases of the nervous system were the most fatal of this class, amounting to 295; this number includes 100 deaths from apoplexy, 38 from convulsions, and 34 from paralysis. Diseases of the respiratory system show 275 deaths for 1903, or nearly one-fourth of the whole mortality in the class, against 337 in the former year. Bronchitis, pneumonia, congestion of the lungs, pleurisy, and allied diseases form this group.

Under the head of "Diseases of the Digestive System" there were 258 deaths at the four centres, including 95 from enteritis; peritonitis, 18; gastritis, 21; cirrhosis of liver, 21; jaundice, and liver disease, 26; and dentition 5.

Diseases of the urinary system caused 102 deaths. The remaining deaths were: 4 of disease of organs of special sense, 258 of organs of the circulatory, 14 of the lymphatic, 44 of the reproductive systems, 8 of the organs of locomotion, and 9 of the integumentary system.

Violent Deaths (at Four Chief Centres).

There were 121 violent deaths, 94 of which were classed as accidental. Ten of these latter were caused by fractures, and 15 by falls. In 14 cases deaths resulted from the deceased being run over by a cart, tram, train, &c. Eleven deaths were from burns or scalds, 14 by drowning, 9 by suffocation, 5 by poisoning, 1 by misadventure with chloroform; besides 7 from accident at birth, and 8 others.

Three deaths were classified as murder or manslaughter. Of 24 suicides, 7 were by shooting, 4 by cutting throat, 6 by poison, 3 by hanging, and 4 by drowning.

Vital Statistics of Australasian Capitals, 1902.

The vital statistics of the chief cities, *with their suburbs*, of Australasia show that the death-rate in Wellington (N.Z.) for 1902 was lower than that of any other of the principal towns, except Sydney, for the same year.

Capital Cities (including Suburbs).	Estimated Mean Population.	Births.		Deaths.		Excess of Births over Deaths.
		Total Number.	Rate per 1,000 of Population.	Total Number.	Rate per 1,000 of Population.	
Melbourne ..	502,120	12,478	24·85	7,496	14·93	4,982
Sydney	502,750	13,002	25·86	5,937	11·81	7,065
Adelaide ..	164,576	3,900	23·70	2,276	13·83	1,624
Brisbane* ..	121,122	3,511	28·99	1,608	13·28	1,903
Perth	40,839	1,449	35·48	753	18·44	696
Hobart ..	34,745	956	27·51	521	14·99	435
Wellington ..	50,967	1,321	25·92	624	12·24	697

* Ten-mile radius.

Deaths in the Whole Colony at various Age-periods.

The average age at death of persons of either sex, in each of the eight years 1896–1903, was as follows:—

	Males.	Females.		Males.	Females.
1896 ..	36·80 years	32·41 years.	1900 ..	40·31 years	36·14 years.
1897 ..	38·80 „	34·77 „	1901 ..	41·64 „	37·68 „
1898 ..	39·29 „	35·69 „	1902 ..	41·07 „	34·88 „
1899 ..	37·73 „	33·54 „	1903 ..	39·56 „	35·43 „

The average expectation of life at each year of age has been compiled from a table given in a paper on the rates of mortality in New Zealand which was recently published by Mr. George Leslie, now Registrar of Friendly Societies. This is the best and most up-to-date information procurable, but it is not guaranteed by the authorities of the Government Life Insurance Department.

The table shows, on comparison with New South Wales figures (Coghlan's), that at birth the expectation of life to the male infant in New Zealand is considerably greater than in the State, the figures being 54·44 years (N.Z.), against 49·60 (N.S.W.), and for females 57·26 and 52·90.

At 21 years of age the expectation in New Zealand for males is 43·77 years, against 41·35 (N.S.W.), and for females 45·59, against 43·62.

At age 45 the comparison is, for males, 25·23 years (N.Z.), 23·27 (N.S.W.); females, 27·46 years (N.Z.), against 25·34 (N.S.W.).

At the age of 70, the limit of a normal life, the figures for New Zealand are—males 9·48 years, females 10·23, against 8·64 for both sexes in New South Wales.

Throughout the comparison is in favour of this country.

Expectation of Life in New Zealand.

Age.	Average Duration of Life: Years.		Age.	Average Duration of Life: Years.		Age.	Average Duration of Life: Years.	
	Male.	Female.		Male.	Female.		Male.	Female.
0	54·444	57·260	35	32·829	34·954	70	9·481	10·227
1	59·102	61·214	36	32·054	34·215	71	8·988	9·673
2	59·169	61·220	37	31·282	33·475	72	8 504	9·130
3	58·626	60·647	38	30·511	32·734	73	8·035	8·604
4	57·924	59·934	39	29·744	31·990	74	7·586	8 095
5	57·167	59·148	40	28·979	31·243	75	7·160	7·614
6	56·396	58·343	41	28·220	30·493	76	6·758	7·164
7	55·606	57·520	42	27·465	29·739	77	6·379	6·742
8	54·791	56·680	43	26·715	28·981	78	6·022	6·349
9	53·956	55·825	44	25 971	28·221	79	5 683	5 982
10	53·094	54·953	45	25·231	27·458	80	5·362	5·636
11	52 212	54·069	46	24·499	26·694	81	5·055	5·312
12	51·315	53·180	47	23·773	25·927	82	4·765	5·005
13	50·425	52·294	48	23·055	25·163	83	4·489	4·714
14	49·539	51·415	49	22·344	24·399	84	4·229	4·439
15	48·663	50·545	50	21·636	23·640	85	3·982	4·180
16	47·803	49·690	51	20·932	22·885	86	3·747	3·935
17	46·960	48·847	52	20·231	22·135	87	3·525	3·705
18	46·139	48·016	53	19·530	21·392	88	3·313	3·487
19	45·336	47·198	54	18·836	20·655	89	3·110	3·283
20	44·551	46·393	55	18·150	19·926	90	2·914	3·089
21	43·775	45·593	56	17·478	19·202	91	2·723	2·905
22	43·005	44·803	57	16·822	18·485	92	2·525	2·731
23	42·235	44·021	58	16·183	17·776	93	2·323	2·564
24	41·463	43·244	59	15·560	17·077	94	2·101	2·400
25	40·684	42·474	60	14·949	16·386	95	1·843	2·238
26	39·899	41·708	61	14·348	15·705	96	1·553	2·082
27	39·108	40·946	62	13·754	15·037	97	1·247	1·931
28	38·319	40·187	63	13·170	14·386	98	0·960	1·774
29	37·526	39·431	64	12·600	13·752	99	0·677	1·600
30	36·736	38·678	65	12·046	13·135	100	0·500	1·424
31	35·949	37·928	66	11·512	12·534	101	...	1·195
32	35·165	37·181	67	10 994	11·945	102	...	0·889
33	34·384	36·438	68	10·486	11·365	103	...	0·500
34	33·605	35·695	69	9·981	10·792			

Orphanhood of Children.

New Zealand statistics give detailed information on this subject, which appears to be unique. In a paper read by Mr. H. W. Manly, actuary of the Equitable Life Assurance Society, on the 27th April, 1903, before the Institute of Actuaries at London, under the heading "Children's Benefits," he stated that in order to ascertain the ages

and the number of children left by a married man at his death he had to go to the same source as Mr. King did when he constructed his table of "Family Annuities"—viz., the "Statistics of the Colony of New Zealand." And further, after announcing his intention of making very considerable use of the information, he gave the tables, grouping five ages together. ("Journal of the Institute of Actuaries," October, 1903.)

Although the subject is not one of general interest, as the Year-book is more often referred to than a statistical volume, it may be excusable to draw attention here to the tables published for the year 1903 and the experience of the quinquennial period, as shown in the "Statistics of New Zealand."

The first table shows, for the year 1903, the total number of men who died at each year of age from twenty upwards; the number of married men stated in the registers as having died (*a*) childless, (*b*) leaving children; and the number and ages of the children living at the time of the father's death. The next is a similar table, but giving five years' results for all ages of the fathers. A condensation of the table is shown.

NEW ZEALAND, 1899 TO 1903.

Ages of Married Men at Death.	Number of Married Men who Died.		Number and Ages of Living Issue.					
	Childless.	Leaving Children.	Under 5	5 to 10.	10 to 15.	15 to 21.	21 and over.	Not specified.
20 to 30 ..	61	136	192	29	1	..	..	4
30 „ 40 ..	114	623	723	691	318	55	..	76
40 „ 50 ..	133	939	595	964	1,079	961	340	173
50 „ 60 ..	209	1,433	309	754	1,211	2,095	3,121	369
60 „ 65 ..	163	1,003	67	180	426	1,013	3,881	270
65 and upwards	586	3,858	69	165	415	1,173	17,428	1,094

A table has also been prepared showing, for the year 1903, the number and ages of the youngest orphan children left.

INFANTILE MORTALITY.

Subjoined is a classified statement of the deaths of infants under one year during 1903, with the ratio of the deaths in each class to the 1,000 births during the year:—

Year.	Sex.	Under 1 Month.	1 and under 3 Months.	3 and under 6 Months.	6 and under 12 Months.	Total under 12 Months.
	NUMBER OF DEATHS.					
1903 ..	Male	391	205	186	195	977
	Female	301	141	181	170	793
	DEATHS TO THE 1,000 BIRTHS.					
1903 ..	Male	34·86	18·28	16·58	17·38	87·10
	Female	28·36	13·29	17·06	16·02	74·73

Eighty-seven out of every thousand of male children born, and seventy-five of every thousand females, are found to have died before attaining the age of one year. The mortality is thus one in eleven of male children and one in thirteen of females, even in New Zealand, where conditions are far more favourable to infant life than in Australia, at least as far as relates to the cities.

It will also be seen from the figures that the chances of living during the first year of age are far greater for female than for male infants. Thus, during the year 1903 there were—

100 deaths of males to 81 deaths of females under 1 month of age;
100 " 73 " from 1 to 3 months of age;
100 " 103 " from 3 to 6 months of age;
100 " 92 " from 6 to 12 months of age;
100 " 86 " under 12 months of age.

The rates of infantile mortality—that is, the proportion the deaths of children under one year of age bear to the births—are higher in the Australian States than in New Zealand.

Dealing with the results for ten years, the deaths of infants under one year are in the large proportion of three-fourths of the total deaths under five, as might be expected, the first year being the tenderest period. (See notes to tables.)

DEATHS OF INFANTS UNDER ONE YEAR, AND PROPORTION TO BIRTHS.

Year.	Deaths of Infants under 1 Year of Age. (Totals for each Year, and Means of 10 Years.)					Total Births registered in each Year, and Mean of 10 Years.	Proportion of Deaths of Infants under 1 Year to every 1,000 Births.
	Under One Month.	1 Month and under 3 Months.	3 Months and under 6 Months.	6 Months and under 12 Months.	Total under 12 Months.		
1894	537	292	324	334	1,507	18,528	81·3
1895	575	333	329	400	1,637	18,546	88·3
1896	566	229	304	340	1,439	18,612	77·3
1897	512	240	269	333	1,354	18,737	72·3
1898	573	289	306	342	1,510	18,955	79·7
1899	619	389	378	420	1,806	18,835	95·9
1900	607	288	293	281	1,469	19,546	75·2
1901	610	272	392	289	1,563	20,491	76·3
1902	665	344	313	390	1,712	20,655	82·9
1903	692	346	367	365	1,770	21,829	81·1
Means of ten years ..	596	303	327	350	1,576	19,473	81·0

NOTE.—The total number of deaths of infants for the period included in the table is 15,767.

DEATHS OF CHILDREN UNDER FIVE YEARS, AND PROPORTION TO DEATHS AT ALL AGES.

Year.	Deaths of Children under 1 to 5 Years of Age. (Totals for each Year, and Means of 10 Years.)						Total Deaths at all Ages for each Year, and Mean of 10 Years.	Deaths under 5 Years: Per Cent. of Mortality at all Ages.
	Under 1 Year.	1 Year and under 2 Years.	2 Years and under 3 Years.	3 Years and under 4 Years.	4 Years and under 5 Years.	Total Deaths under 5 Years.		
1894	1,507	236	96	97	68	2,004	6,918	28·97
1895	1,637	255	102	88	57	2,139	6,863	31·17
1896	1,439	215	59	76	64	1,853	6,432	28·81
1897	1,354	187	84	69	38	1,732	6,595	26·26
1898	1,510	200	91	72	47	1,920	7,244	26·50
1899	1,806	291	111	74	56	2,338	7,680	30·44
1900	1,469	205	93	64	58	1,889	7,200	26·24
1901	1,563	208	85	68	52	1,976	7,634	25·88
1902	1,712	307	118	92	61	2,290	8,375	27·34
1903	1,770	275	126	111	64	2,346	8,528	27·51
Means of ten years	1,576	238	97	82	56	2,049	7,347	27·91

NOTE.—The total number of deaths included in this table of children under 5 years is 20,487.

Although 15,767 infants (under one year) were lost to the colony by death during the decade, and 20,487 children under five, the third table shows much more satisfactory results for this colony than for New South Wales or Victoria in the matter of the preservation of infant life. Dealing with averages of five years, in New Zealand only 82 infants under one year are found to die out of every 1,000 born, against 111 in New South Wales and 110 in Victoria.

Year.	Proportion of Deaths of Infants under 1 Year of Age to every 1,000 Births.		
	New Zealand.	New South Wales.	Victoria.
1898	79·7	121·9	134·1
1899	95·9	118·7	110·9
1900	75·2	103·3	95·3
1901	76·3	103·7	102·9
1902	82·9	109·7	108·6
Means of five years	82·0	111·5	110·4

European countries show still higher mortality of infants than the principal Australian States: Great Britain, 150 (under one year) to every 1,000 births; France, 170; Austria, still higher; Sweden is a notable exception.

The principal causes of mortality in children under one year for New Zealand are given, with the numbers of deaths for five years from such causes. Premature birth stands first in order of importance, marasmus or debility coming next.*

New Zealand.—Deaths under One Year.—Principal Causes.

Principal Causes of Deaths of Infants.	1899.	1900.	1901.	1902.	1903.
Miasmatic diseases	143	85	41	92	191
Diarrhœal diseases	226	152	95	176	122
Premature birth	259	276	264	303	301
Convulsions	129	106	91	82	103
Bronchitis, pneumonia, pleurisy ..	237	140	207	235	241
Enteritis	124	134	116	154	167
Marasmus, &c...	270	231	260	294	270

A table is added to show that higher mortality obtains in the large towns than in New Zealand as a whole and two States of Australia.

Year.	Wellington and Suburbs.			Sydney and Suburbs.			Melbourne and Suburbs.		
	Total Births.	Deaths of Infants under 1 Year.	Proportion of Deaths of Infants under 1 Year to 1,000 Births.	Total Births.	Deaths of Infants under 1 Year.	Proportion of Deaths of Infants under 1 Year to 1,000 Births.	Total Births.	Deaths of Infants under 1 Year.	Proportion of Deaths of Infants under 1 Year to 1,000 Births.
1898 ..	1,198	157	131·1	11,913	1,826	153·3	12,016	1,919	159·7
1899 ..	1,187	140	117·9	12,239	1,473	120·4	12,435	1,552	124·8
1900 ..	1,243	91	73·2	12,127	1,322	109·0	12,067	1,364	113·0
1901 ..	1,326	133	100·3	12,601	1,517	120·4	12,375	1,536	124·1
1902 ..	1,321	172	130·2	13,002	1,457	112·1	12,498	1,590	127·2
Means of five years	1,255	139	110·5	12,376	1,519	123·0	12,278	1,592	129·7

* The report of the Royal Commission on the decline of the birth-rate in New South Wales (1904), besides giving statistics of infantile mortality, describes *the conditions that operate in producing such mortality.* Recommendations are also made, and the subject of feeding and care of infants dealt with.

Causes of Death (the whole Colony).

The deaths registered in the colony during 1903, arranged in the several classes according to their assigned causes, give the rates shown on the next page.

Causes of Death.	Number of Deaths.			Proportion to Total Deaths.			Proportion per 10,000 living, 1903.	Proportion per 10,000 living, 1902.
	Male.	Female.	Total.	Male.	Female.	Total.		
				Per Cent.	Per Cent.	Per Cent.		
Class I. Specific febrile or zymotic diseases,—								
Order 1. Miasmatic diseases	315	307	622	6·34	8·57	7·29	7·58	6·05
" 2. Diarrhœal diseases	106	78	184	2·14	2·18	2·16	2·24	3·45
" 3. Malarial diseases	...	...	...	...	...	...	...	0·03
" 4. Zoogenous diseases	...	...	...	...	...	...	...	...
" 5. Venereal diseases	14	3	17	0·28	0·09	0·20	0·21	0·19
" 6. Septic diseases	37	56	93	0·78	1·56	1·09	1·14	0·80
Total Class I.	472	444	916	9·54	12·40	10·74	11·17	10·52
Class II. Parasitic diseases	8	2	10	0·16	0·06	0·12	0·12	0·10
Class III. Dietetic diseases	49	18	67	0·99	0·50	0·78	0·82	0·85
Class IV. Constitutional diseases	832	702	1,534	16·82	19·60	17·99	18·70	19·30
Class V. Developmental diseases	501	382	883	10·13	10·67	10·35	10·77	10·60
Class VI. Local diseases,—								
Order 1. Diseases of nervous system	488	394	882	9·87	11·00	10·34	10·75	10·75
" 2. Diseases of organs of special sense	3	3	6	0·06	0·09	0·07	0·07	0·10
" 3. Diseases of circulatory system	544	374	918	11·00	10·44	10·77	11·19	11·96
" 4. Diseases of respiratory system	583	396	979	11·79	11·06	11·48	11·94	13·26
" 5. Diseases of digestive system	416	336	752	8·41	9·38	8·82	9·17	9·20
" 6. Diseases of lymphatic system	11	28	39	0·22	0·78	0·46	0·47	0·35
" 7. Diseases of urinary system	234	97	331	4·73	2·71	3·87	4·04	4·11
" 8. Diseases of reproductive system,—								
(*a.*) Of organs of generation	...	28	28	...	0·78	0·33	0·34	0·34
(*b.*) Of parturition	...	100	100	...	2·79	1·17	1·22	1·07
" 9. Diseases of locomotive system	16	6	22	0·32	0·17	0·26	0·27	0·38
" 10. Diseases of integumentary system	17	5	22	0·34	0·14	0·26	0·27	0·14
Total Class VI.	2,312	1,767	4,079	46·74	49·34	47·83	49·73	51·66
Class VII. Violence,—								
Order 1. Accident or negligence	492	122	614	9·94	3·41	7·20	7·49	6·56
" 2. Homicide	2	1	3	0·04	0·03	0·04	0·03	0·02
" 3. Suicide	87	18	105	1·76	0·50	1·23	1·28	1·00
" 4. Execution	...	...	...	...	...	...	...	...
Total Class VII.	581	141	722	11·74	3·94	8·47	8·80	7·58
Class VIII. Ill-defined and not-specified causes	192	125	317	3·88	3·49	3·72	3·86	4·36
Grand totals	4,947	3,581	8,528	100·00	100·00	100·00	103·97	104·97

The next table shows, for either sex, the number of deaths from each cause registered during the year 1903 :—

CAUSES OF DEATH.

Class.	Causes of Death. Orders and Diseases.	Males.	Females.	Total.
I.—SPECIFIC FEBRILE OR ZYMOTIC DISEASES.	ORDER 1.—*Miasmatic.*			
	Small-pox	1	...	1
	Chicken-pox	...	1	1
	Measles	62	81	143
	Epidemic rose-rash, rubeola	...	...	...
	Scarlet fever, scarlatina	63	68	131
	Typhus	...	...	...
	Bubonic plague ...	...	...	...
	Dengue	...	...	...
	Relapsing fever	...	...	...
	Influenza	30	26	56
	Whooping-cough ...	102	102	204
	Mumps	2	...	2
	Diphtheria	15	8	23
	Cerebro-spinal fever ...	...	...	...
	Simple and ill-defined fever	...	...	...
	Enteric fever, typhoid ...	40	21	61
	Other miasmatic diseases	...	...	...
	Total Order 1 ...	315	307	622
	ORDER 2.—*Diarrhœal.*			
	Simple cholera	3	3	6
	Diarrhœa	97	68	165
	Dysentery	6	7	13
	Total Order 2 ...	106	78	184
	ORDER 3.—*Malarial.*			
	Remittent fever... ...	...	...	...
	Ague	...	...	...
	Beriberi	...	...	...
	Total Order 3 ...	...	...	...
	ORDER 4.—*Zoogenous.*			
	Hydrophobia	...	...	...
	Glanders	...	...	...
	Splenic fever	...	...	...
	Cow-pox and other effects of vaccination... ...	...	...	...
	Total Order 4 ...	...	...	...
	ORDER 5.—*Venereal.*			
	Syphilis	7	3	10
	Gonorrhœa, stricture of urethra, ulcer of groin	7	...	7
	Total Order 5 ...	14	3	17
	ORDER 6.—*Septic.*			
	Phagedæna	...	...	...
	Erysipelas	10	11	21
	Pyæmia, septicæmia ...	27	17	44
	Puerperal fever, pyæmia, septicæmia	...	28	28
	Total Order 6 ...	37	56	93
	Total Class I. ...	472	444	916

Class.	Causes of Death. Orders and Diseases.	Males.	Females.	Total.
II.—PARASITIC DISEASES.	Thrush	...	...	...
	Other diseases from vegetable parasites ...	...	...	...
	Hydatid disease ...	8	1	9
	Worms	...	1	1
	Other diseases from animal parasites	...	...	...
	Total Class II. ...	8	2	10
III.—DIETETIC DISEASES.	Starvation, exposure ...	2	...	2
	Want of breast-milk ...	4	1	5
	Scurvy	...	1	1
	Intemperance—			
	Chronic alcoholism ...	26	13	39
	Delirium tremens ...	7	...	7
	Other dietetic diseases ...	10	3	13
	Total Class III. ...	49	18	67
IV.—CONSTITUTIONAL DISEASES.	Rheumatic fever ...	21	17	38
	Rheumatism	4	3	7
	Gout	...	...	...
	Rickets	4	3	7
	Cancer	325	257	582
	Tabes mesenterica, tubercular peritonitis ...	18	32	50
	Tubercular meningitis, acute hydrocephalus ...	38	36	74
	Phthisis	321	249	570
	Other forms of tuberculosis, scrofula	38	37	75
	Purpura, hæmorrhagic diathesis	5	4	9
	Anæmia, chlorosis, leucocythæmia ...	19	17	36
	Diabetes mellitus ...	36	41	77
	Other constitutional diseases	3	6	9
	Total Class IV. ...	832	702	1,534
V.—DEVELOPMENTAL DISEASES.	Premature birth ...	165	136	301
	Atelectasis	12	8	20
	Cyanosis	5	5	10
	Spina bifida	8	8	16
	Imperforate anus ...	2	...	2
	Cleft palate, hare-lip ...	2	3	5
	Other congenital defects	8	6	14
	Old age	299	216	515
	Total Class V. ...	501	382	883
VI.—LOCAL DISEASES.	ORDER 1.—*Diseases of Nervous System.*			
	Inflammation of the brain or its membranes	54	44	98
	Cerebro-spinal meningitis	..	8	8
	Apoplexy	138	146	284
	Softening of brain ...	16	7	23
	Hemiplegia, brain paralysis	21	20	41

CAUSES OF DEATH—*continued.*

Class.	Causes of Death. Orders and Diseases.	Males.	Females.	Total.
VI.—LOCAL DISEASES—*continued.*	ORDER 1.—*Diseases of Nervous System*—contd.			
	Paralysis (undescribed)	39	42	81
	Paralysis agitans	4	1	5
	Insanity, general paralysis of insane	35	5	40
	Chorea	...	1	1
	Epilepsy	40	14	54
	Convulsions	66	63	129
	Laryngismus stridulus	...	1	1
	Idiopathic tetanus	2	2	4
	Paraplegia, diseases of spinal cord	17	7	24
	Locomotor ataxia	7	...	7
	Other diseases of nervous system	49	33	82
	Total Order 1	488	394	882
	ORDER 2.—*Diseases of Organs of Special Sense.*			
	Otitis, otorrhœa	3	3	6
	Epistaxis, and diseases of nose	...	...	...
	Ophthalmia, and diseases of eye	...	...	...
	Total Order 2	3	3	6
	ORDER 3.—*Diseases of Circulatory System.*			
	Endocarditis, valvular disease	395	265	660
	Pericarditis	4	5	9
	Hypertrophy of heart	3	...	3
	Fatty degeneration of heart	24	25	49
	Angina pectoris	11	7	18
	Syncope	68	40	108
	Aneurism	18	3	21
	Senile gangrene	3	2	5
	Embolism, thrombosis	14	25	39
	Phlebitis	3	2	5
	Varicose veins, piles	...	...	...
	Other diseases of circulatory system	1	...	1
	Total Order 3	544	374	918
	ORDER 4.—*Diseases of Respiratory System.*			
	Laryngitis	3	5	8
	Croup	9	8	17
	Other diseases of larynx and trachea	2	...	2
	Asthma, emphysema	24	5	29
	Bronchitis	198	138	336
	Pneumonia	270	194	464
	Pleurisy	39	19	58
	Other diseases of respiratory system	38	27	65
	Total Order 4	583	396	979

Class.	Causes of Death. Orders and Diseases.	Males.	Females.	Total.
VI.—LOCAL DISEASES—*continued.*	ORDER 5.—*Diseases of Digestive System.*			
	Stomatitis, cancrum oris	2	2	4
	Dentition	10	12	22
	Sore throat, quinsy	5	1	6
	Dyspepsia	2	3	5
	Hæmatemesis	5	1	6
	Melæna	7	3	10
	Diseases of stomach, gastritis	40	47	87
	Enteritis	127	118	245
	Ulceration, perforation, of intestine	4	2	6
	Ileus, obstruction of intestine	26	26	52
	Stricture or strangulation of intestine	3	...	3
	Intussusception of intestine	6	4	10
	Hernia	19	10	29
	Fistula	1	1	2
	Peritonitis	35	51	86
	Ascites	...	1	1
	Gall-stones	3	10	13
	Cirrhosis of liver	34	10	44
	Other diseases of liver, hepatitis, jaundice	44	24	68
	Other diseases of digestive system	43	10	53
	Total Order 5	416	336	752
	ORDER 6.—*Diseases of Lymphatic System and Ductless Glands.*			
	Diseases of lymphatic system	4	4	8
	Diseases of spleen	1	...	1
	Bronchocele	5	19	24
	Addison's disease	1	5	6
	Total Order 6	11	28	39
	ORDER 7.—*Diseases of Urinary System.*			
	Acute nephritis	31	23	54
	Bright's disease	86	51	137
	Uræmia	15	10	25
	Suppression of urine	4	1	5
	Calculus	6	1	7
	Hæmaturia	3	..	3
	Diseases of bladder and prostate	54	6	60
	Other diseases of urinary system (kidney diseases undescribed)	35	5	40
	Total Order 7	234	97	331
	ORDER 8.—*Diseases of Reproductive System.*			
	(*a.*) Diseases of organs of generation,—			
	Ovarian disease	...	3	3

CAUSES OF DEATH—*continued.*

Class.	Causes of Death. Orders and Diseases.	Males.	Females.	Total.
VI.—LOCAL DISEASES—*continued.*	ORDER 8.—*Diseases of Reproductive System*—ctd.			
	(*a.*) Diseases of organs of generation—*ctd.*			
	Diseases of uterus and vagina	...	21	21
	Disorders of menstruation	...	2	2
	Pelvic abscess	...	2	2
	Perineal abscess ...	...	...	...
	Diseases of testes, penis, scrotum, &c.	...	...	...
	(*b.*) Diseases of parturition,—			
	Abortion, miscarriage ...	...	25	25
	Puerperal mania ...	...	...	...
	Puerperal metritis ...	...	1	1
	Puerperal convulsions ...	...	8	8
	Placenta prævia (flooding)	...	11	11
	Phlegmasia dolens ...	...	1	1
	Other accidents of childbirth	...	54	54
	Total Order 8 ...	...	128	128
	ORDER 9.—*Diseases of Organs of Locomotion.*			
	Caries, necrosis	5	3	8
	Arthritis, ostitis ...	7	...	7
	Other diseases of organs of locomotion	4	3	7
	Total Order 9 ...	16	6	22
	ORDER 10.—*Diseases of Integumentary System.*			
	Carbuncle	1	1	2
	Phlegmon, cellulitis ...	9	..	9
	Lupus	...	1	1
	Ulcer, bed-sore	...	...	...
	Eczema	6	1	7
	Pemphigus	1	1	2
	Other diseases of integumentary system ...	...	1	1
	Total Order 10 ...	17	5	22
	Total Class VI. ...	2,312	1,767	4,079
VII.—VIOLENCE.	ORDER 1.—*Accident or Negligence.*			
	Fractures, contusions ...	202	21	226
	Gunshot wounds ...	21	1	22
	Cut, stab	9	4	13
	Burn, scald	30	27	57
	Sunstroke	...	...	...
	Poison	7	8	15
	Drowning	191	28	219
	Suffocation	14	19	33
	Otherwise	18	11	29
	Total Order 1 ...	492	122	614
	ORDER 2.—*Homicide.*			
	Murder, manslaughter ...	2	1	3
	Wounds in battle ...	...	...	...
	Total Order 2 ...	2	1	3
	ORDER 3.—*Suicide.*			
	Gunshot wounds ...	20	2	22
	Cut, stab	21	...	21
	Poison	14	10	24
	Drowning	11	4	15
	Hanging	15	2	17
	Otherwise	6	...	6
	Total Order 3 ...	87	18	105
	ORDER 4.—*Execution.*			
	Hanging	...	...	...
	Total Class VII. ...	581	141	722
VIII.—ILL-DEFINED AND NOT-SPECIFIED CAUSES.	Dropsy	...	...	...
	Marasmus, &c.	178	123	301
	Mortification, gangrene ...	...	...	...
	Tumour	...	...	...
	Abscess	1	1	2
	Hæmorrhage	1	1	2
	Sudden (cause unascertained)	12	...	12
	Other ill-defined and not-specified causes ...	...	...	...
	Total Class VIII. ...	192	125	317
	General totals ...	4,947	3,581	8,528

MORTALITY FROM FEBRILE AND ZYMOTIC DISEASES.

The deaths in 1903 from specific febrile or zymotic diseases amounted to 916, a proportion of 11·17 in every 10,000 persons living, an increase of 77 on the number of deaths in 1902, when the proportion was 10·52. A heavier mortality from measles, scarlet fever, whooping-cough, enteric fever, and septic diseases were the causes of the increased death-rate in this class.

The diseases in this class that have caused the greatest mortality during the past ten years are stated in the table that follows. Of

these, diarrhœal complaints were by far the most fatal, causing 2,400 deaths in the decennial period. Influenza comes next, with 1,494 deaths; typhoid fever third, with 929 deaths; whooping-cough fourth, with 881 deaths; diphtheria fifth, with 578 deaths; measles next, 501 deaths; puerperal fever with 229 deaths; and scarlet fever with 210 deaths:—

Diseases.	1894.	1895.	1896.	1897.	1898.	1899.	1900.	1901.	1902.	1903.
Measles	14	..	1	1	56	137	9	6	134	143
Scarlet fever and scarlatina	5	..	4	2	2	..	10	17	39	131
Diphtheria ..	92	76	74	49	45	58	63	44	54	23
Whooping-cough ..	190	150	24	2	6	123	90	9	83	204
Influenza ..	233	125	89	120	219	135	181	219	117	56
Diarrhœal diseases	207	232	334	257	275	298	199	139	275	184
Enteric or typhoid fever	115	94	124	106	120	93	68	95	53	61
Puerperal fever ..	38	32	10	18	19	15	24	20	25	28

The mortality from measles from 1894 to 1898 was not great, but rose to 137 deaths in 1899, falling again to 9 deaths in 1900 and 6 deaths in 1901, again rising to 134 in 1902, and further to 143 deaths in 1903. From scarlet fever and scarlatina there were 131 deaths last year—a very serious increase. The mortality from diphtheria, which was 92 deaths in 1894, fell to 23 deaths in 1903, the figures for the intervening years not presenting any striking features.

Whooping-cough in 1894 destroyed 190 lives, and 150 in 1895, but was in 1896, 1897, and 1898 much less fatal. In 1899 the mortality sprang up again to a total of 123 deaths, against 90 in 1900, 9 in 1901, and 83 in 1902. Last year the mortality was heavy, the number of deaths being 204.

The deaths from influenza numbered only 56 in 1903, while the figures for the nine previous years ranged from 89 to 233, the last being for the earliest of the decennial period (1894).

From diarrhœal complaints the deaths in 1903 were 184, against 275 in 1902; while in 1896 the mortality reached the height of 334 deaths, and in 1889 was even higher (355), with a much smaller population than in 1903.

Enteric or typhoid fever was more fatal in 1903 than in 1902, the figures being 61 deaths, against 53. The highest mortality during the decennium was in 1896, when the deaths numbered 124 for the colony.

Bubonic-plague Prevention.

The year 1900 saw the outbreak of the disease known as the bubonic plague, in Sydney and other parts of Australia. In that year there was one death from plague in New Zealand, which occurred at Auckland. None happened in the year 1901, but three deaths from this cause, all males, were registered at Auckland during 1902. No deaths from plague were recorded in 1903. The Public Health Department is taking every possible precaution.

Vaccination.

From small-pox there was one death in 1903. The vaccinations registered for the last ten years are as under :—

Year.	Total Vaccinations registered of Children under 14 Years of Age.	Vaccinations of Children under 1 Year of Age.	Number of Births registered.	Proportion of Successful Vaccinations of	
				Children under 14 Years of Age to Total Births. Per Cent.	Children under 1 Year of Age to Total Births. Per Cent.
1903 ..	11,683	5,566	21,829	53·52	25·50
1902 ..	8,763	2,611	20,655	42·43	12·64
1901 ..	3,768	1,984	20,491	18·39	9·68
1900 ..	4,525	3,151	19,546	23·15	16·12
1899 ..	5,133	3,379	18,835	27·25	17·94
1898 ..	10,349	5,507	18,955	54·60	29·05
1897 ..	12,440	6,162	18,733	66·41	32·89
1896 ..	11,917	5,727	18,612	64·03	30·78
1895 ..	8,523	5,882	18,546	44·34	31·72
1894 ..	9,322	6,006	18,528	50·31	32·42

The number of successful vaccinations of children registered in 1903 was 11,683, against 8,763 in 1902. The fall prior to 1902 was consequent on the alteration of the law relative to vaccination in England, and subsequently in this colony, while the increase shown for last year was no doubt due to a slight visitation of small-pox from abroad, which caused the death mentioned above.

One child in every four born in 1903 is shown to have been successfully vaccinated in that year. The procedure under the new law as regards vaccination is similar to that previously in force. The Registrar issues a notice when a birth is registered, with forms for certificate as to the result of vaccination attached. Vaccination is still compulsory, if exemption is not secured in four months from date of birth. But everything is now subject to the provisions of the "exemption clause," which is the main feature, and governs the rest. Any parent or custodian who has conscientious objections—believing that vaccination would be injurious to the child's health—can apply for a certificate of exemption to a Magistrate or

Registrar of Births; and, when the child's parent or guardian is resident outside of a borough, the application may be made to and certificate granted by a Justice of the Peace.

Eight thousand five hundred and eighty-eight exemption certificates were issued from the 13th October, 1900, when the Act came into force, to the end of the year 1903. Of these 4,261 belong to the year 1903, when, as before stated, the successful vaccination of children under one year of age amounted to 5,566, or 25 per cent. of births.

When no exemption certificate is obtained, the law now allows to the parent *twelve months* instead of *six* from date of birth in which to vaccinate, and a similar period from date of taking charge of child in case of a custodian. There are penalties for not vaccinating, as before. One conviction for neglecting to vaccinate a child removes liability until the child is four years of age.

The figures given above do not include Maoris vaccinated, nor vaccinations of adult persons other than Natives.

Parasitic Diseases.

There were 10 deaths from parasitic diseases, the proportion per 10,000 living being 0·12. Deaths from hydatids numbered 9 in 1903.

Dietetic Diseases.

Under the class "Dietetic diseases" are included 46 deaths from intemperance. But these cannot be said to represent the full extent of the mortality really caused by the abuse of alcoholic liquors. Many deaths of intemperate persons are attributed to disease of the liver, kidneys, &c., in the medical certificates.

Constitutional Diseases: Phthisis, Cancer, etc.

The deaths from constitutional diseases in 1903 numbered 1,534, or 18·70 per 10,000 of population, and 18 out of every 100 deaths from all causes. This class of disease is more fatal than any other except that defined as "Local diseases," on account of the great numbers of deaths from cancer and phthisis, with other tubercular complaints, which are classed as "Constitutional."

The number of deaths from phthisis was 570 in 1903. The deaths in 1903 were in the proportion of 6·95 in every 10,000 persons living, against 7·73 in the previous year.

Figures for ten years are quoted, showing that the total number of deaths from this disease in 1902 was the highest recorded during the decennium, though the rate had been higher in some of the previous years.

Year.	Deaths from Phthisis.	Rate per 10,000.
1894	576	8·48
1895	553	7·99
1896	523	7·40
1897	596	8·26
1898	597	8·11
1899	593	7·91
1900	577	7·56
1901	596	7·66
1902	617	7·73
1903	570	6·95

In Australasia the rate is materially increased by the deaths of persons who have come out either already suffering from phthisis or predisposed thereto. There is no reason for believing that this circumstance has more effect on the death-rate in Australia than in New Zealand; so that the lower rate referred to in previous issues of this work as obtaining in this colony may be taken as proof of the superiority of its climate for withstanding consumptive tendencies.

The death-rate of England and Wales from phthisis, though declining, is far higher than that of New Zealand. In 1900 it stood at 13·32 per 10,000.

Phthisis is now known to be and is treated as an infectious preventible disease caused by the bacillus tuberculosis, which is communicable in many ways. Certain constitutions are far more predisposed than others to receive this bacillus, especially under conditions of life unfavourable to robust health, when a nidus is formed for the development of the bacillus. The Government has established a sanatorium for consumptives at Hamilton in the Waikato, and further institutions are contemplated.

From other forms of tuberculosis the deaths in 1903 were 199, or 2·43 per 10,000 of population. Thus a large addition has to be made to the deaths from phthisis to appreciate the full mischief done by tubercular disease.

Deaths from all Tubercular Diseases.

The mortality from all forms of tubercular disease, taken together, has been at the average rate of about 10¼ persons per 10,000 living for the last ten years. This rate is far lower than that which obtained in England during the year 1900, when the proportion was 19 per 10,000 living.

A table is supplied showing the results for each of ten years in New Zealand. Besides the death-rate from tubercular diseases, it also shows the percentage of deaths by tubercle to those from all causes, which was from 9·02 to 11·57 per cent. for the decennial period 1894–1903.

DECENNIAL TABLE, 1894–1903, SHOWING THE DEATH-RATE FROM TUBERCLE PER 10,000 LIVING AND PERCENTAGE OF TOTAL DEATHS.

Year.	Mean Population.	Number of Deaths from Tubercular Diseases.	Rate per 10,000.	Percentage of Total Deaths from All Causes.
1894	679,196	752	11·07	10·87
1895	692,417	761	10·99	11·09
1896	706,846	680	9·62	10·57
1897	721,609	763	10·57	11·57
1898	736,260	769	10·44	10·62
1899	749,984	795	10·60	10·35
1900	763,594	752	9·85	10·44
1901	777,968	775	9·96	10·15
1902	797,793	802	10·05	9·58
1903	820,217	769	9·38	9·02

DECENNIAL TABLE, 1894–1903. — Deaths from various Tubercular Diseases registered in New Zealand, specifying the Number under and over Five Years of Age.

Persons.

Year.	Tabes Mesenterica, Tubercular Peritonitis.		Tubercular Meningitis, Acute Hydrocephalus		Phthisis.		Other Forms of Tuberculosis, Scrofula.		Total Deaths from Tuberculosis.		Total All Ages.
	Under 5 Years.	Over 5 Years.	Under 5 Years.	Over 5 Years.	Under 5 Years.	Over 5 Years.	Under 5 Years.	Over 5 Years.	Under 5 Years.	Over 5 Years.	
1894 ..	36	13	33	30	7	569	16	48	92	660	752
1895 ..	47	15	25	37	5	548	28	56	105	656	761
1896 ..	36	11	30	28	5	518	19	33	90	590	680
1897 ..	35	9	33	32	7	589	13	45	88	675	763
1898 ..	37	12	37	38	10	587	11	37	95	674	769
1899 ..	43	19	32	40	10	583	12	56	97	698	795
1900 ..	20	20	24	55	13	564	9	47	66	686	752
1901 ..	30	22	30	31	10	586	14	52	84	691	775
1902 ..	26	19	36	30	5	612	8	66	75	727	802
1903 ..	22	28	39	35	9	561	11	64	81	688	769

Nine deaths from "lupus" recorded during the decennium have not been included in the above table. They were all deaths of adult persons (4 males and 5 females). One death, that of a female, aged fifty-six years, was registered as from this disease in 1903.

It will be seen that the term "tubercular diseases" includes "phthisis," "tabes mesenterica," "tubercular peritonitis," "tubercular meningitis," "acute hydrocephalus," with other forms of tuberculosis (scrofula, &c.). Of these the mortality from phthisis forms by far the greatest part of the whole. Thus, in 1903 there were 570 deaths from phthisis out of a total of 769 deaths from all tubercular complaints. Of 570 deaths by phthisis, only 9 were of persons under 5 years of age.

Examination of the next table, giving the full series of ages of persons who died from tubercular disease during the year 1903, shows that of 50 deaths from tabes mesenterica, with tubercular peritonitis, 22 were of children under 5 years. Also that, of 74 deaths from tubercular meningitis, with acute hydrocephalus, 39 were of persons under 5 years, and 26 from 5 to 20 years. Under "other forms of tuberculosis" (excepting phthisis) the greater numbers of deaths are at ages under 30 years.

The mortality from phthisis is heaviest at 20–30 years, being 183 deaths out of 570 of all ages; but large numbers are found in the columns as far as that for the advanced term of 65 to 70 years, at which the deaths for 1903 were 25, and 14 deaths from this cause are of persons of 70 years and upwards.

TABLE showing the Number of Deaths from Tubercular Diseases registered in New Zealand during the Year 1903, arranged in Groups of Ages.

Persons.

—	Under 1 Year.	Under 5 Years.	5 to 15.	10 to 15.	15 to 20.	20 to 25.	25 to 30.	30 to 35.	35 to 40.	40 to 45.	45 to 50.	50 to 55.	55 to 60.	60 to 65.	65 to 70.	70 to 75.	75 to 80.	80 and upwards.	Total, 5 Years and over.	All Ages.
Tabes Mesenterica, Tubercular Peritonitis	18	22	...	3	4	3	4	10	1	..	1	...	1	...	1	...	...	...	28	50
Tubercular Meningitis, Acute Hydrocephalus	18	39	10	8	8	2	...	6	1	...	...	...	...	...	...	...	...	...	35	74
Phthisis	3	9	9	6	43	93	90	66	73	50	30	21	21	20	25	9	3	2	561	570
Other forms of Tuberculosis, Scrofula	7	11	3	3	10	11	11	4	10	5	1	...	2	1	2	...	...	1	64	75
Totals ...	46	81	22	20	65	109	105	86	85	55	32	21	24	21	28	9	3	3	688	769

To show the mortality from tuberculosis in various parts of the colony, a table giving the deaths in the various provincial districts is added, which, however, only shows that the mortality is distributed very much according to population. The deaths in the North Island are, however, found to be 65 fewer than those for the South Island, or 352 deaths and 417 deaths for those divisions respectively:—

TABLE showing the Number of Deaths from Tubercular Disease registered in each Provincial District of New Zealand during the Year 1903.

Provincial District.	Tabes Mesenterica, Tubercular Peritonitis.	Tubercular Meningitis, Acute Hydrocephalus.	Phthisis.	Other Forms of Tuberculosis, Scrofula.	Total Deaths from Tuberculosis.
Auckland ..	14	21	135	12	182
Taranaki ..	3	3	20	..	26
Hawke's Bay	..	..	22	3	25
Wellington ..	8	10	88	13	119
Marlborough	2	..	10	3	15
Nelson ..	2	3	23	4	32
Westland ..	1	2	20	2	25
Canterbury ..	6	12	120	13	151
Otago ..	14	23	132	25	194
Totals ..	50	74	570	75	769

Legislative action before referred to has been already taken in the direction of guarding the life and health of the people from tubercle; further than this, the complete isolation of consumptive patients, with the disinfecting of their sputa and of everything that has been in contact with them, is suggested from time to time as a necessary measure.

Cancer.

The deaths from cancer during the year 1903 were 582. There were more deaths of males than of females, the numbers being—males 325, females, 257. The rate of mortality per 10,000 living was 7·10. The apparent increase in deaths from this disease is shown further on and compared with that of England. But the increase is not believed by all authorities to be a fact to the extent represented, but partly the result of more careful certification of the causes of death, and of improved diagnosis in cases of what is termed inaccessible cancer.

It is certain, however, that out of a total of 8,528 deaths from all causes in New Zealand during 1903, 582, or 6·82 per cent., were caused by cancer.

The death-rate from cancer is not so great as that from tubercular diseases, but is nevertheless a most alarming matter, not only on account of the number of deaths, but because of its progressive increase.

A decennial table shows that the deaths from cancer per 10,000 persons living rose from 6·01 in 1894 to 7·10 in 1903; and that whereas 5·90 out of every 100 deaths were attributable to cancer ten years ago, the proportion had grown to 6·82 last year.

TABLE showing for each of the Ten Years 1894 to 1903 the Number of Persons registered as having died from Cancer, the Proportion of Deaths from Cancer per 10,000 living, and the Percentage of all Deaths attributed to Cancer.

Year.	Estimated Mean Population.	Deaths from Cancer.	Total Deaths, all Causes.	Deaths from Cancer per 10,000 of Living Persons.	Percentage of Total Deaths due to Cancer.
1894 ..	679,196	408	6,918	6·01	5·90
1895 ..	692,417	383	6,863	5·53	5·58
1896 ..	706,846	389	6,432	5·50	6·05
1897 ..	721,609	395	6,595	5·47	5·99
1898 ..	736,260	471	7,244	6·40	6·50
1899 ..	749,984	468	7,680	6·24	6·09
1900 ..	763,594	430	7,200	5·63	5·97
1901 ..	777,968	515	7,634	6·62	6·75
1902 ..	797,793	536	8,375	6·72	6·40
1903 ..	820,217	582	8,528	7·10	6·82

To exhibit how cancer affects the different parts of the human body in respect of each sex, the experience of five years (1899, 1900, 1901, 1902, and 1903) is shown in a succeeding table. Of any single organ affected, the stomach is the one most liable to be the seat of cancer among males, although with this sex the disease was for the year 1903 apparently to about the same extent located in the mouth, lips, tongue, and throat, taking these parts all together. Next to the stomach, the liver is with males the part which is most often attacked, to judge by mortality records, and next in order come the intestines and rectum. Afterwards, but at a considerable distance, follow the kidneys, bladder, and urethra.

Amongst the females, the organs of generation, ovaries, uterus, and vagina, as a group, show most cases of mortality from cancer; but, as with the males, the stomach is, of any single organ, the one most affected, the liver coming next, then the breast, and then the intestines and rectum. Females do not contract cancer in the mouth (judging by the returns of deaths), tongue, lips, and throat to nearly the same extent as prevails among males. Whatever may be the cause, the figures are remarkable, being only 6 out of every 100 deaths from cancer among females, against 29 out of every 100 of males dying from the same cause; or, expressed in numbers, 49 deaths of females occurred against 290 of males from cancer in the mouth, &c., in a five years' experience of mortality.

DEATHS FROM CANCER, 1899, 1900, 1901, 1902, AND 1903.

TABLE showing the Number of Deaths of Males and Females from Cancer during the Years 1899 to 1903, classified according to the Part of the Body affected.

Part affected.	1899.		1900.		1901.		1902.		1903.	
	Number of Deaths.	Proportion of Specified.	Number of Deaths.	Proportion of Specified.	Number of Deaths.	Proportion of Specified.	Number of Deaths.	Proportion of Specified.	Number of Deaths.	Proportion of Specified.
Males.										
Mouth, lip, tongue, throat, neck, &c...	65	Per Cent. 27·43	68	Per Cent. 31·78	60	Per Cent. 24·69	63	Per Cent. 24·14	99	Per Cent. 33·56
Stomach	87	36·71	80	37·38	97	39·92	112	42·91	96	32·54
Intestines, rectum ..	20	8·44	26	12·15	32	13·17	32	12·26	35	11·87
Liver	40	16·88	25	11·68	37	15·23	38	14 56	35	11·87
Kidneys, bladder, urethra, &c. ..	17	7·17	9	4·21	13	5·35	12	4·60	17	5·76
Leg, foot, &c. ..	6	2·53	4	1·87	..	..	..	..	4	1·35
Lung	2	0·84	2	0·93	4	1·64	4	1·53	9	3·05
	237	100·00	214	100·00	243	100·00	261	100·00	295	100·00
Not specified ..	34	..	32	..	22	..	35	..	30	..
Totals ..	271	..	246	..	265	..	296	..	325	..
Females.										
Mouth, tongue, throat, &c. ..	17	9·71	6	3·73	6	2·77	16	7·44	21	9·05
Breast	20	11·43	17	10·56	38	17·51	33	15·35	33	14·23
Stomach	40	22·86	28	17·39	61	28·11	43	20·00	51	21·98
Intestines, rectum ..	14	8·00	21	13·04	19	8·76	33	15·35	28	12·07
Kidneys, bladder ..	4	2·29	5	3·11	2	0·92	8	3·72	5	2·16
Ovary, uterus, vagina	50	28·57	54	33·54	55	25·35	44	20·46	48	20·69
Liver	25	14·29	25	15·53	29	13·36	33	15·35	38	16·38
Gall-bladder, spleen, pancreas ..	3	1·71	2	1·24	2	0·92	3	1·40	4	1·72
Lung, spine, thigh, shoulder ..	2	1·14	3	1·86	5	2·30	2	0·93	4	1·72
	175	100·00	161	100·00	217	100·00	215	100·00	232	100·00
Not specified ..	22	..	23	..	33	..	25	..	25	..
Totals ..	197	..	184	..	250	..	240	..	257	..

Considering the numbers of persons dying at the different age-periods, the following table of ten years' results shows the age of 30 years to be the time of life at which deaths from cancer begin to be numerous (it is really 35 for males and 30 for females). The maximum of deaths is reached at the period 60 to 65 for males, and 55 to 60 for females. These remarks are given without reference to the numbers of persons living at the various ages.

Deaths from cancer, it will be observed, are very rare among children under 5 years, and not frequent in those above that age.

TABLE showing the Number of Persons (Males and Females) at Different Ages registered as having died from Cancer in New Zealand during the Ten Years 1894 to 1903.

Year.	Under 1 Year.				Total under 1 Year.	1 to 2.	2 to 3.	3 to 4.	4 to 5.	Total under 5 Years.	5 to 10.	10 to 15.	15 to 20.	20 to 25.	25 to 30.	30 to 35.	35 to 40.	40 to 45.	45 to 50.	50 to 55.	55 to 60.	60 to 65.	65 to 70.	70 to 75.	75 to 80.	80 and upwards.	Total 5 Years and over.	All Ages.
	Under 1 Month.	1 to 3 Months.	3 to 6 Months.	6 to 12 Months.																								
1894 ...	...	...	...	...	...	...	...	1	...	1	1	...	3	1	5	11	15	27	41	64	73	71	38	26	24	7	407	408
1895 ...	...	...	...	...	...	...	...	...	...	...	2	...	..	3	1	6	11	25	47	61	64	63	38	37	19	6	383	383
1896 ...	...	...	...	...	...	...	...	...	2	2	2	1	1	2	5	6	14	21	36	59	74	67	49	29	14	7	387	389
1897 ...	...	1	...	...	1	...	1	...	1	3	...	2	1	1	...	7	10	22	41	42	71	74	49	35	29	8	392	395
1898 ...	...	...	...	...	...	...	...	2	...	2	1	2	2	5	5	8	17	36	47	47	77	79	69	35	30	9	469	471
1899 ...	...	...	...	...	...	...	...	1	...	1	3	3	...	1	4	6	15	21	42	48	82	64	87	45	27	19	467	468
1900 ...	...	1	...	...	1	...	...	1	...	2	...	...	6	2	2	6	7	16	40	35	75	78	59	51	31	20	428	430
1901 ...	...	...	1	...	1	...	...	...	...	1	2	...	4	5	5	8	20	31	53	60	65	80	74	63	33	11	514	515
1902 ...	...	...	...	...	...	...	...	...	...	...	1	...	3	5	5	7	22	35	49	50	72	88	86	67	31	15	536	536
1903 ...	1	...	...	...	1	...	...	...	...	1	4	1	2	6	10	9	20	37	47	68	69	87	96	72	38	15	581	582

The numbers of deaths of persons from cancer in each provincial district are given in another table, according to age-groups, but the result merely shows the disease to be one found everywhere throughout the colony—at least, there is no sufficient evidence of climatic conditions affecting the mortality to a great extent in any particular part of the country.

TABLE showing the Number of Deaths from Cancer registered in each Provincial District of the Colony of New Zealand during the Years 1900–1903.

Provincial Districts.	1900.			1901.			1902.			1903.		
	Under 5 Years.	Over 5 Years.	Total.	Under 5 Years.	Over 5 Years.	Total.	Under 5 Years.	Over 5 Years.	Total.	Under 5 Years.	Over 5 Years.	Total.
Auckland	1	107	108	1	91	92	...	115	115	...	117	117
Taranaki	...	9	9	...	24	24	...	24	24	...	21	21
Hawke's Bay	...	15	15	...	16	16	...	15	15	...	26	26
Wellington	...	79	79	...	83	83	...	95	95	1	107	108
Marlborough	...	11	11	...	7	7	...	7	7	...	6	6
Nelson	...	19	19	...	34	34	...	33	33	...	28	28
Westland	...	11	11	...	26	26	...	19	19	...	35	35
Canterbury	...	74	74	...	98	98	...	98	98	...	105	105
Otago	1	103	104	...	135	135	...	130	130	...	136	136
Totals	2	428	430	1	514	515	...	536	536	1	581	582

The following extract from a contribution to *The Lancet*, by Dr. W. Vernon Shaw, is of interest :—

"The growth of cancer cells is to be looked upon as an effort of reproduction in damaged tissue, the incidence of the damage falling upon the nuclear structures. This damage alters the nature of these structures so that the vegetative functions of the cell run riot, and the cells become parasitic towards the organism in which the growth is taking place. The nature of the changes in the cancer cells and their life history thus becomes the important point from which the origin of the cancer process must be determined.

What is the cause of this vegetative activity? Is it an initial damage to the cells in response to which there is an over-active attempt at repair? The peculiar frequency of such disease in organs once active but now undergoing involution would suggest this explanation, and also the frequent origin of malignant growths in damaged tissue further supports this view."

The death-rates for cancer in respect of each sex are given for each of nine years, selected to show the position as from 1886 to 1903 :—

DEATHS FROM CANCER IN EVERY 10,000 PERSONS OF EACH SEX LIVING IN NEW ZEALAND.

Year.	Males.	Females.	Year.	Males.	Females.
1886	3·69	3·67	1900	6·12	5·09
1890	4·72	4·79	1901	6·48	6·77
1894	6·65	5·27	1902	7·05	6·35
1898	6·77	5·98	1903	7·51	6·63
1899	6·85	5·56			

The mortality was higher among the males than among the females (with the exception of 1890 and 1901), which is the reverse of English experience, where the rate was 6·72 per 10,000 of males and 9·75 of females for the year 1900. In the United Kingdom, however, the rate of increase is so much higher among males than with females that the Registrar-General calculates equilibrium will be reached in about the year 1932, and thereafter the rate among males would exceed the rate among females.

The increase in the numbers for the sexes together for England and New Zealand is represented in the proportions below :—

DEATHS FROM CANCER IN EVERY 10,000 PERSONS LIVING.

Year.	New Zealand.	England.	Year.	New Zealand.	England.
1881	2·69	5·20	1896	5·50	7·64
1886	3·68	5·90	1899	6·24	8·29
1891	4·68	6·92	1900	5·63	8·28

The actual number of deaths of persons of either sex and all ages registered in New Zealand during the last thirteen years was :—

	Males.	Females.	Totals.
1891	154	141	295
1892	173	134	307
1893	188	144	332
1894	240	168	408
1895	208	175	383
1896	205	184	389
1897	210	185	395
1898	263	208	471
1899	271	197	468
1900	246	184	430
1901	265	250	515
1902	296	240	536
1903	325	257	582
Totals ..	3,044	2,467	5,511

Mortality from Developmental Diseases.

The total of deaths from developmental diseases was 883, or 10·77 per 10,000 persons living. The mortality from premature birth comprised 301 deaths, and that from atelectasis, cyanosis, and other congenital defects 67 deaths. The proportion of deaths from premature birth varies from 11 to 15 out of every 1,000 births, and that from congenital defects from 2 to 4 per 1,000 births. Particulars for eight years exhibit the annual rates:—

Number and Proportions per 1,000 Births.

Year.	Deaths from Premature Birth. No.	Deaths from Premature Birth. Proportion per 1,000.	Deaths from Congenital Defects. No.	Deaths from Congenital Defects. Proportion per 1,000.
1896	230	12·36	46	2·47
1897	211	11·26	52	2·78
1898	251	13·24	54	2·85
1899	261	13·86	47	2·50
1900	276	14·12	55	2·81
1901	264	12·88	63	3·07
1902	303	14·66	79	3·82
1903	301	13·79	67	3·07

Stating the result in another way, there was one death from premature birth to every 72 births in 1903, and one death from congenital defect to every 326 births. In England the proportion of deaths from premature birth to every 1,000 births was as high as 19·93 in the year 1900.

Old Age.

Deaths from old age in 1903 numbered 515, against 464 in 1902.

Mortality from Local Diseases.

Deaths by diseases of the nervous system were 882, or 10·34 out of every 100 deaths from all causes, and 10·75 out of every 10,000 persons living. Of the 882 deaths, 284 were credited to apoplexy,

129 to convulsions, and 98 to inflammation of the brain and its membranes. Paralysis, including hemiplegia and paralysis of the insane, caused 167 deaths, and locomotor ataxia 7 deaths. Paraplegia, with diseases of the spinal cord, caused 24 deaths. Deaths from nervous diseases (excluding convulsions of children) numbered 759, or 9·25 per 10,000 persons living.

Diseases of the circulatory system resulted in 918 deaths, being 10·77 out of every 100 from all causes, and 11·19 per 10,000 persons living. Of the total number in this order, endocarditis and valvular disease of the heart contributed 660 deaths. From angina pectoris there were 18 deaths, from syncope 108, from aneurism 21, and from other forms of heart-disease (hypertrophy, fatty degeneration, and pericarditis) 61.

Diseases of the respiratory system show 979 deaths, of which 800 were attributable to bronchitis and pneumonia. Taken together, these two complaints were the cause of more deaths than was phthisis; and adding 58 from pleurisy, 17 from croup, 8 from laryngitis, and 96 from other respiratory diseases, the mortality in the order is found to be 11·48 per cent. of the total deaths, and 11·94 per 10,000 of the population.

Deaths from diseases of the digestive system also formed a large proportion of the whole (8·82 per cent.), the number being 752. Enteritis was most fatal, showing 245 deaths, liver-diseases (112) and gastritis (87) coming next.

Of 331 deaths from diseases of the urinary system in 1903, the deaths from Bright's disease of the kidneys (albuminuria) numbered 137.

Violent Deaths.

Deaths by violence form a large item in the total mortality. In 1903 the proportion per 10,000 of persons living was 8·80, the total number of deaths having been 722.

Of 581 males who died violent deaths, 87 were suicides. The deaths of females by violence were far fewer than those of males, amounting to 141, and out of these only 18 committed suicide. A table given previously states the full list of deaths from external or violent causes for the year 1903.

Accidental deaths numbered 614—males 492 and females 122. Of the total male deaths, 202 resulted from fractures or contusions, and 191 from drowning. Of the female deaths, 28 were due to drowning.

Hospitals, Lunatic Asylums, Benevolent Asylums, and Charitable Institutions.

Hospitals.

Prior to the abolition of provinces the hospitals of the colony were supported mainly out of provincial revenues. After that event the expenditure for hospitals was for the most part charged

against the revenue of counties and municipal corporations, until October, 1885, when "The Hospitals and Charitable Institutions Act, 1885," came into force.

The portion of the colony included within the three principal islands—the North, Middle, and Stewart Islands—is divided into thirty-three hospital districts, each consisting of one or more counties with the interior boroughs, to be presided over by elective Boards, designated "Hospital and Charitable Aid Boards."

The revenues of these Boards accrue from the following sources:—

(1.) Rents and profits of land and endowments vested in the Board, or set apart for the benefit of particular institutions;
(2.) Voluntary contributions;
(3.) Grants from contributory local authorities; and
(4.) Subsidies from the Consolidated Fund (these being at the rate of 10s. for every £1 of bequests, but in no case exceeding £500 in respect of any one bequest; £1 4s. for every £1 of voluntary contributions; and £1 for every £1 received from any local authority).

The contributory local authorities (being the County and Borough Councils, and Boards of road and town districts where the Counties Act is not in force) are empowered by the Act to raise by special rates the amounts assessed by the Hospital District Boards as their proportionate contributions to the Hospital and Charitable Aid Fund.

The District Boards undertake the general management and control of those hospitals that are not incorporated in terms of the Act, and are required to contribute to the support of the incorporated hospitals. To be incorporated a hospital must have as many as 100 subscribers contributing not less than £100 annually by amounts of not less than 5s., and must have been declared by the Governor in Council, after receipt by him of a duly signed petition, to be a body politic and corporate, under the government of trustees.

There are 47 hospitals in the colony, of which 25 are incorporated institutions, while 22 are directly managed and controlled by District Boards. In 1903 these hospitals afforded accommodation for 1,239 male and 738 female patients, a total of 1,977. The number of cubic feet of space included within the walls of all the sleeping-wards was 2,840,424, which gave an average of 1,467 cubic feet to each bed. 9,031 males and 4,587 females were admitted as patients during the year 1903, and 786 male and 354 female patients were inmates at the end of the year. The total number of indoor patients during the year was 14,757—viz., 9,821 males and 4,936 females.

Outdoor relief was also given to a very large number of persons; but, as in some of the hospitals no records are kept of the outdoor patients, it is impossible to state the number of distinct persons who received such relief.

The total revenues of the various hospitals as at five different annual periods were :—

—	1898–99.	1899–1900.	1900–1901.	1901–1902.	1902–1903.
	£	£	£	£	£
Voluntary contributions and bequests	11,991	9,188	7,330	11,154	11,539
Payments by patients	13,066	16,503	15,998	18,083	19,613
From Government	41,052	44,815	47,074	54,387	55,881
From Hospital Boards and local authorities	33,864	35,006	36,812	40,638	44,013
Rents and other sources ..	5,523	5,097	6,908	7,588	8,222
Totals	105,496	110,609	114,122	131,850	139,268

Benevolent Asylums and Charitable Institutions.

The various benevolent asylums and charitable institutions are placed on a similar footing to the hospitals. Most of the Boards of hospital districts are also Charitable Aid Boards ; but, for the purpose of distributing charitable aid only, some of the hospital districts have been united into larger districts, so that, although there are thirty-three Boards for hospital purposes, there are only twenty-three for charitable-aid purposes.

Returns were received from nineteen benevolent asylums (not including orphanages), established for the support of indigent persons. The number of inmates in these institutions at the end of 1903 was 1,193, of whom 726 were males and 467 females. Outdoor relief was given by two of these institutions to 1,955 persons (including 1,216 children).

Auckland Sailors' Home.

There is a Sailors' Home at Auckland for the use of seafaring men resident in or visiting the town. The late Edmund Costley having left a large sum for charitable purposes, it was resolved to employ the bequest in building and endowing an institution where sailors might be received without distinction of race or religious belief, and board, lodging, and refreshments provided for them, together with such instruction and amusements as might tend to promote their social comfort and general welfare.

The Home, built in 1887, has room for 35 inmates, who are charged 15s. a week for board and lodging. It is managed by a council of eight members elected by the subscribers to the institution. The late Primate of New Zealand, who first originated the scheme, was Life President.

Orphan Asylums.

There were in 1903 four orphan asylums in the colony, one maintained by a District Hospital Board, one by the Church of England

authorities, and two by clergy of the Roman Catholic Church; three of them receiving, at the charge of the State, orphan, destitute, and other children committed to them by a Stipendiary Magistrate.

Exclusive of the children so committed, 24 male and 36 female orphans were received during the year 1903, and 54 male and 91 female orphans remained as inmates at the end of the year.

Orphanages receiving committed children are, for that purpose, constituted "industrial schools."

Lunatic Asylums.

There are seven public lunatic asylums in the colony, maintained wholly or in part out of the public revenue. There is also one private asylum, licensed by the Governor for the reception of lunatics.

The amount of sleeping-accommodation provided in each of the public asylums is shown in tabular form, giving separately the number and cubic contents of the sleeping-rooms intended for one person only, and of the dormitories occupied by several inmates conjointly, together with the number of patients actually in the asylums on the 31st December, 1903:—

—	Sleeping-rooms for One Person only.			Dormitories for more than One Person.		
	Number.	Aggregate Number of Cubic Feet.	Inmates (Patients) on 31st December, 1903.	Number.	Aggregate Number of Cubic Feet.	Inmates (Patients) on 31st December, 1903.
Auckland ..	133	120,609	133	25	254,400	441
Wellington ..	68	61,280	68	16	100,173	190
Porirua ..	68	63,217	68	16	336,487	504
Nelson ..	25	29,609	25	14	65,111	119
Hokitika ..	31	23,223	31	8	69,302	138
Christchurch	80	69,651	80	35	254,010	424
Seacliff ..	172	141,421	172	47	265,262	508
Totals ..	577	509,010	577	161	1,344,745	2,324

At Ashburn Hall, Waikari, there are 66 rooms, each for one person only, with an aggregate cubic content of 64,913 ft. The number of patients on the 31st December, 1903, was 40.

At the end of 1903, 1,751 male and 1,168 female patients (including 18 out on trial) were under the care of the asylum officers of the colony. Of these, 1,619 males and 1,087 females were regarded as incurable, 9 males and 9 females were out on trial, and 123 males and 72 females were supposed to be curable. 257 male and 129 female patients were discharged during the year.

The following shows the proportion of insane—or, rather, of inmates of lunatic asylums and those out on trial—to the population (exclusive in each case of Maoris) at the end of the years stated:—

1884,	1 insane person	to every	393	of population.
1886,	"	"	370	"
1888,	"	"	365	"
1890,	"	"	348	"
1892,	"	"	339	"
1894,	"	"	316	"
1896,	"	"	308	"
1898,	"	"	300	"
1899,	"	"	296	"
1900,	"	"	288	"
1901,	"	"	286	"
1902,	"	"	286	"
1903,	"	"	284	"

It must not be overlooked that the proportions are increased by the admission into the asylums of inebriates, idiots, and others, who should not properly be there.

Information as to lunacy, extracted from the results of the census, will be found on pp. 125 and 126.

Deaf, Dumb, and Blind.

Particulars relating to the deaf, dumb, and blind, as ascertained at last census, are referred to on pp. 121 to 124 *ante*.

SECTION IX.—METEOROLOGY.

Temperature, Rainfall, Atmospheric Pressure, and Wind, throughout New Zealand, as observed at Eight Stations, for the Year 1903.

The Observations were taken at 9.30 a.m.

Stations and Months.	Temperature in Shade.		Rainfall.		Mean Height of Barometer.	Prevailing Wind.
	Highest.	Lowest.	Wet Days.	Fall.		
Auckland (lat. 36° 50′ S.; long. 174° 50′ 40″ E.; alt. 125 ft.)—	° Fahr.	° Fahr.	No.	Inches.	Inches.	
January	76·5	52·0	19	7·13	30·00	SW, NE.
February	78·0	50·0	9	2·08	30·19	NE.
March	76·5	49·0	8	1·38	30·18	SW.
April	71·0	47·0	15	2·66	30·18	NE, SW.
May	64·0	44·0	20	6·09	30·17	SW, NW.
June	62·0	40·0	20	3·20	30·14	SW.
July	61·0	38·0	20	3·46	30·13	SW, NE.
August	61·0	38·0	20	3·37	29·98	SW, NE.
September	64·0	42·0	16	2·40	29·95	NE, SW.
October	72·0	51·0	14	3·27	30·18	NE.
November	70·0	44·0	18	6·83	29·99	NE.
December	77·0	56·0	14	3·26	29·93	SW, NE.
Rotorua (lat. 38° 9′ S.; long. 176° 15′ E.; alt. 990 ft.)—						
January	79·0	41·0	13	8·98	30·13	W.
February	82·0	37·0	6	3·30	30·30	N.
March	81·0	35·0	5	1·88	30·33	SW, N.
April	75·0	37·0	10	4·06	30·34	SW, W.
May	67·0	28·0	16	7·84	30·25	SW, NE.
June	58·0	25·5	13	2·58	30·19	SW.
July	59·0	26·0	10	4·84	30·20	SW, W.
August	58·0	27·0	17	4·32	30·21	SW.
September	66·0	27·0	11	2·22	30·15	SW, NE.
October	74·0	41·0	17	3·88	30·53	N, NE.
November	79·0	33·0	18	6·71	30·26	NE, N.
December	82·0	62·0	15	4·58	30·20	W, NE.

Stations and Months.	Temperature in Shade.		Rainfall.		Mean Height of Barometer.	Prevailing Wind.
	Highest.	Lowest	Wet Days.	Fall.		
New Plymouth (lat. 39° 3′ 35″ S.; long. 174° 4′ 58″ E.; alt. 100 ft.)—	° Fahr.	° Fahr.	No.	Inches.	Inches.	
January	84·0	36·0	27	6·08	30·01	NW, SW.
February	83·0	41·0	17	3·70	30·20	NW, SW.
March	83·0	38·0	17	2·69	30·19	SE, W.
April	83·0	40·0	20	4·13	30·05	SE.
May	78·0	35·0	19	17·78	30·00	SE.
June	72·0	33·0	21	3·77	30·03	SE, SW.
July	74·0	32·0	23	5·40	30·00	SE.
August	80·0	32·0	26	6·97	29·97	SE, SW.
September	83·0	36·0	20	3·78	29·95	SE, SW.
October	82·0	42·0	16	3·80	30·25	SE, NE.
November	84·0	36·0	18	7·31	30·03	NE, SE.
December	82·0	51·0	17	3·76	29·94	W, NW, NE.
Wellington (lat. 41° 16′ 25″ S.; long. 174° 46′ 20″ E.; alt. 140 ft.)—						
January	78·5	42·0	12	3·86	29·852	NW.
February	78·0	43·0	9	1·88	30·087	NW.
March	74·0	43·0	10	1·95	30·095	NW, SW.
April	70·0	40·0	10	4·51	30·038	NW.
May	65·5	36·5	14	8·95	30·037	NW, SW.
June	62·0	32·0	16	3·04	29·988	NW.
July	60·0	34·0	20	7·48	30·013	NW, SW.
August	62·7	31·0	23	9·88	29·979	S, NW.
September	63·5	33·0	17	4·36	29·964	S, NW.
October	72·4	42·0	7	0·67	30·292	NW.
November	79·5	38·2	12	5·41	30·083	NW.
December	78·7	48·5	11	1·81	29·920	NW.
Hokitika (lat. 42° 41′ 30″ S.; long. 170° 49′ E.; alt. 12 ft.)—						
January	86·0	38·0	18	13·79	29·813	SW.
February	80·5	42·5	14	11·42	30·027	SW.
March	79·0	39·0	13	8·65	30·101	SW.
April	73·0	33·0	11	5·59	29·652	SW, E.
May	63·0	33·0	13	8·38	29·963	E, SW.
June	65·0	29·0	11	3·59	29·946	E.
July	61·5	28·0	15	9·62	29·953	E, NW.
August	59·0	29·0	18	8·66	29·950	E, SW, NW.
September	70·0	31·5	14	5·77	29·924	SW, E.
October	76·0	39·0	10	14·29	30·257	SW, NW.
November	74·5	37·0	5	3·21	29·992	SW, E.
December	80·0	47·0	18	9·88	29·871	SW, NW.

Stations and Months.	Temperature in Shade.		Rainfall.		Mean Height of Barometer.	Prevailing Wind.
	Highest.	Lowest.	Wet Days.	Fall.		
Lincoln College, Canterbury (lat. 43° 32′ 16″ S.; long. 172° 38′ 59″ E.; alt. 65 ft.)—	° Fahr.	° Fahr.	No.	Inches.	Inches.	
January	78·8	56·6	13	3·145	29·742	NE.
February	83·4	42·4	11	1·180	29·957	NE, SE.
March	82·0	28·5	8	1·250	29·981	NE, SW.
April	74·0	31·0	9	2 345	29·945	NE.
May	68·0	35·5	15	3·625	29·962	SW.
June	58 8	23·6	12	1·195	29·921	W, NW.
July	64·6	22·0	13	2·125	29·957	SW, NE.
August	70·0	27·2	14	2·060	29 956	SW, NE.
September ..	72·0	29·1	7	0·990	29·958	NE, SW.
October	82·0	36·6	6	0·175	30·166	NE.
November	83·8	36·2	13	2·025	30·024	NE, SW.
December	79·3	36·4	6	0·775	29·783	NE.
Dunedin (lat. 45° 52′ 11″ S.; long. 170° 31′ 7″ E.; alt. 300 ft.)—						
January	70·0	38·0	18	5·652	29·688	W.
February	80·0	42·0	9	1·458	29·862	SW.
March	70·0	38·0	12	2·540	29·873	SW, W.
April	68·0	35·0	14	3·596	29·882	W, NE.
May	60·0	34 0	16	5·950	29·936	SW, W.
June	53·0	27·0	13	4·630	29·812	SW, W.
July	57·2	28·0	12	2 628	29·881	SW, W.
August	60·0	32·0	17	1·940	29·873	SW.
September	61·0	33·0	14	1·674	29·839	NE.
October	77 0	36·0	8	4·160	30·064	NE, SW.
November	76·0	35·0	12	5·172	29·914	SW, NE.
December	76·0	40·0	18	3·374	29·713	W, NE.
Chatham Islands (lat. 43° 52′ S.; long. 176° 42′ W.; alt. 100 ft.)—						
January	66·0	41·0	14	3·77	29 63	SW.
February	68·0	39·0	11	1·17	29·82	SW.
March	63·0	37·0	22	5·02	29·71	SW.
April	63·0	38·0	14	2·89	29 82	NE.
May	63·0	34·0	26	4·46	29·93	N, SW.
June	60·0	31·0	26	2 82	29·56	SW.
July	61·0	30·0	17	2·56	29·72	N, SW.
August	56 0	30·0	18	5·11	29·65	SW.
September	56·0	30·0	22	2·32	29·66	SE, SW.
October	62·0	39·0	3	0·65	30·50	SW, NW.
November	64·0	39·0	11	1·37	29·90	NW, SW.
December	67·0	39·0	15	1·53	29·71	SW, W, NW.

EIGHT STATIONS: COMPARATIVE TABLE: YEAR 1903.

Stations.	Temperature in Shade.		Rainfall.		Mean Height of Barometer.	Prevailing Wind.
	Highest, and Date.	Lowest, and Date.	Days on which Rain fell.	Greatest Fall, and Date.		
	° Fahr.	° Fahr.	No.	Inches.	Inches.	
Auckland	78·0, 15 Feb.	38·0, 16, 26 July, 4 Aug.	193	1·84, 17 Jan.	30·085	SW, NE.
Rotorua	82·0, 17 Feb., 30 Dec.	25·5, 8 June	151	2·88, 18 Jan.	30·26	SW.
New Plymouth ...	84·0, 6, 13 Jan., 4, 24, 28, 29 Nov.	32·0, 15, 16 July, 31 Aug.	241	3·80, 28 May	30·05	SE.
Wellington	79·5, 30 Nov.	31·0, 2 Aug.	161	3·75, 14 Aug.	30·029	NW.
Hokitika	86·0, 22 Jan.	28·0, 31 July	160	6·30, 13 Feb.	29·954	SW.
Lincoln	83·8, 25 Nov.	22·0, 17 July	127	1·15, 26 Jan.	29 946	NE.
Dunedin	80·0, 12 Feb.	27·0, 8 June	163	2·44, 1 June	29·945	SW, W. NE.
Chatham Islands ...	68·0, 19 Feb.	30·0, 31 July, 7 Aug., 2 Sept.	199	2·25, 18 Aug.	29·80	SW.

SUNSHINE IN NEW ZEALAND.

The comparative tables of the amount of sunshine recorded in Surrey and in Christchurch respectively during 1902, and published in the Christchurch *Press*, afford valuable proof of the brightness of this climate as compared with that of England. The English records were taken at a place near Hindhead, on the Surrey highland, first made known by Professor Tyndall selecting a site for a house there. The district has since become famous as one of the healthiest and sunniest in England, and these characteristics, coupled with its comparative proximity to London, have made it a popular residential district. It is a case, then, of one of the most sunny districts in England being compared with a New Zealand town, which we can hardly suppose to be more blessed with sunshine than many other places in the colony. This being so, it will be admitted that Christchurch comes splendidly out of the test with 1,749·59 hours of sunshine during the year, as against Surrey's 1,492·2 hours, a difference in favour of New Zealand of 257 hours. Nor is this the most striking comparison. The sun shone here on all but thirty-nine days in the year, while at Hindhead there were no less than eighty-one absolutely sunless days. The monthly average of days on which the sun shone in Christchurch was twenty-seven, in Surrey it was under twenty-four. The winter comparisons are still more forcible. Taking the four-

months from November to February as the English winter months, and those from May to August as the corresponding months out here, we find that whereas three of the months in England had but sixteen days each on which sunshine was recorded, and the fourth had only fifteen days, in Christchurch during the winter months the sun was seen on twenty-eight, twenty, thirty, and twenty nine days respectively. Our worst month was June, with little more than fifty-five hours of sunshine; but in Surrey December had only forty-two sunny hours, January had fifty-four, and February fifty-five. On the other hand, the best English summer record beats ours. July in Surrey had 229 hours of sunshine, our January had 217; but it must be remembered that summer days in England are longer than with us, just as our winter days are longer than with them.

Grayshot, Surrey, England.				Christchurch, New Zealand.			
Months, 1902.	Days with Sun.	Days no Sun.	Total Hours.	Corresponding Months in New Zealand.	Days with Sun.	Days no Sun.	Total Hours.
Spring—				Spring—			
February ..	15	13	55·7	August ..	29	2	146·16
March ..	26	5	118·5	September	29	1	149·58
April ..	28	2	165·3	October ..	31	0	191·50
Summer—				Summer—			
May ..	28	3	179·0	November ..	28	2	203·20
June ..	27	3	189·6	December ..	27	4	143·58
July ..	30	1	229·4	January ..	29	2	217·75
Autumn—				Autumn—			
August ..	30	1	136·9	February ..	25	3	154·08
September ..	29	1	178·0	March ..	23	8	121·25
October ..	23	8	78·8	April ..	27	3	97·08
Winter—				Winter—			
November ..	16	14	64·0	May ..	28	3	110·58
December ..	16	15	42·8	June ..	20	10	55·75
January ..	16	15	34·2	July ..	30	1	159·08
Total ..	284	81	1492·2	Total ..	326	39	1749·59

The following table, compiled from information published in the Statistical Abstract for the Colonial Possessions of the United Kingdom, shows the shade temperature for each month in New Zealand and other British States and Colonies. The figures given are the means of four years (H signifies highest, and L lowest) :—

British Possessions (Stations and Height in Feet above Sea Level where known).	Jan.		Feb.		March.		April.		May.		June.		July.		Aug.		Sept.		Oct.		Nov.		Dec.		Year.	
	H.	L.	H.	L.	H.	L.	H.	L.	H.	L.	H.	L.	H.	L.	H.	L.	H.	L.	H.	L.	H.	L.	H.	L.	H.	L.
	°F.	°F.	°F.	°F.	°F.	°F.	°F.	°F.	°F.	°F.	°F.	°F.	°F.	°F.	°F.	°F.	°F.	°F.	°F.	°F.	°F.	°F.	°F.	°F.	°F.	°F.
New Zealand—																										
Wellington (140)	78	45	78	47	76	44	70	43	66	38	62	34	59	33	62	34	65	37	69	41	74	33	75	44	78	33
Queensland—																										
Brisbane (130)	92	64	93	63	91	61	85	54	80	50	76	42	75	39	78	41	85	46	91	50	94	57	97	61	97	39
New South Wales—																										
Sydney (155)	92	59	89	58	84	59	79	51	72	48	67	44	63	39	70	42	77	45	88	48	87	54	94	57	94	39
Victoria—																										
Melbourne (91)	101	48	99	47	99	45	86	40	74	37	64	37	62	32	68	34	74	34	81	40	94	44	96	45	101	32
South Australia—																										
Adelaide (140)	108	49	106	50	100	48	89	45	78	40	67	38	65	36	74	39	79	41	86	41	96	45	101	48	108	36
Western Australia—																										
Perth (47)	107	50	102	53	98	52	96	57	81	40	70	38	70	37	73	38	80	42	83	42	93	48	100	51	107	37
Tasmania—																										
Hobart (160)	91	45	94	45	93	44	75	38	71	37	61	34	59	33	66	33	72	35	77	35	92	40	86	43	94	33
Natal—																										
Durban (150)	99	63	95	61	94	60	94	58	89	52	86	49	88	48	91	49	96	50	91	53	97	57	98	59	99	49
Cape Town—																										
Royal Observatory (37)	94	54	90	51	92	49	86	45	80	42	76	39	74	37	76	37	83	39	86	44	89	48	90	52	94	37
Hongkong—																										
Observatory (110)	73	47	78	46	77	49	84	58	89	68	91	73	91	74	91	74	92	70	90	66	82	55	79	49	91	46
Straits Settlements—																										
Singapore (30)	88	70	90	70	91	71	91	73	90	73	90	72	90	72	89	72	89	71	89	71	89	71	89	70	91	70
Mauritius—																										
Royal Alfred Observatory (179) ...	84	69	84	71	84	70	82	70	80	62	77	60	75	59	75	59	77	62	80	62	82	66	84	68	84	59
Canada—																										
Toronto (350)	47	-3	45	-3	51	6	71	22	78	31	86	44	88	46	89	47	82	41	71	27	56	13	45	-1	89	-3
Montreal (187)	45	-14	42	-13	44	0	69	24	81	32	87	43	88	50	86	50	81	39	70	27	59	11	43	-11	88	-14
St. John (*N.B.*) (116)	49	-7	46	-7	47	4	62	22	69	33	81	42	79	49	77	48	73	37	60	26	56	16	49	-3	81	-7
Halifax (122)	50	-1	46	-3	50	10	63	22	73	32	83	39	84	48	84	49	80	36	69	29	60	21	51	3	84	-3
Charlottetown, Prince Edward Island (38)	47	-6	43	-9	47	5	60	20	70	31	77	39	80	49	79	49	75	39	66	30	58	19	47	1	80	-9
Winnipeg, Manitoba (764) ...	34	-37	32	-37	49	-25	76	8	82	20	90	35	87	40	91	34	86	30	73	17	53	-16	39	-29	91	-37
Victoria, British Columbia (10) ...	51	14	55	22	60	30	67	29	73	38	76	39	79	43	76	44	71	38	64	35	55	30	51	23	79	14
St. John's, Newfoundland (125) ...	48	-6	50	-8	50	11	61	15	71	27	76	33	81	41	79	42	78	33	65	24	62	19	51	9	81	-8
Barbados—																										
Joes River (430)	81	67	81	67	83	69	84	70	84	71	85	72	84	70	85	70	85	71	85	71	84	70	83	69	85	67
Bahamas—																										
Military Hospital	77	63	79	68	79	67	84	69	89	72	88	73	89	78	89	73	87	75	86	77	82	70	77	67	89	63
Jamaica—																										
Kingston (60)	91	63	90	63	90	62	91	68	91	70	92	71	95	71	93	73	92	70	93	69	91	67	90	63	95	62
Trinidad (130)	86	67	87	68	88	69	88	70	89	70	86	71	86	71	86	70	89	70	88	70	87	70	85	69	89	67

SECTION X.—ACCUMULATION: PRICES AND WAGES.

Banks of Issue.

In December, 1903, five banks of issue were doing business in New Zealand, the Bank of New Zealand and the Colonial Bank having amalgamated in 1895. Two of the five banks, the Bank of New Zealand and the National Bank of New Zealand (Limited), are wholly New Zealand institutions. The total average liabilities of all five banks for the year 1903 in respect of New Zealand transactions were £20,563,879, and the average assets £19,913,546. The average amount on deposit during the year was £19,011,114, of which sum £1,572,800 belonged to the General Government. Excluding those belonging to Government, deposits to the value of £8,839,963 were bearing interest, and £8,598,351 at call. The value of the notes in circulation of these banks was £1,450,267.

The development of banking in New Zealand since the year 1857 has been very great. Taking for each year the average of the four quarters' returns made by the banks of issue, the figures for 1857, 1870, 1880, 1890, 1900, and 1903 are :—

Year.	Deposits. £	Assets. £	Liabilities. £
1857	343,316	419,860	432,494
1870	3,127,769	6,315,354	3,819,670
1880	8,538,935	14,220,275	9,550,177
1890	12,368,610	17,735,259	13,356,598
1900	15,570,610	17,314,535	16,964,582
1903	19,011,114	19,913,546	20,563,879

In 1880 the deposits of these banks were £18 per head of the mean population; in 1890 they were £19·92 per head; and in 1903, £23·18. The ratio of advances to deposits, which was 132·34 per cent. in 1880, reached its maximum in 1883, when it stood at 173·35 per cent. The proportion since that year fell, till in 1897 it was only 76·21 per cent. In succeeding years there were fluctuations until 1903, when the ratio stood at 75·96 per cent.

The following figures, which are taken from the published returns for the December quarter of each year, show that the value of the coin and bullion held by all the banks of issue doing business in New Zealand rose steadily from 1891 to 1895, in which year the value stood at £3,333,272. Since that date the value gradually decreased year by year to £2,636,177 in December quarter, 1899, but rose again to £3,746,580 in 1903 :—

Quarter ended 31st December.	Coin.	Gold and Silver in Bullion or Bars.	Total Coin and Bullion.
	£	£	£
1890	2,421,530	169,659	2,591,189
1891	2,231,242	126,346	2,357,588
1892	2,381,319	141,406	2,522,725
1893	2,480,453	121,496	2,601,949
1894	3,103,355	118,121	3,221,476
1895	3,199,889	133,383	3,333,272
1896	3,171,702	122,901	3,294,603
1897	2,848,183	107,635	2,955,818
1898	2,625,896	126,349	2,752,245
1899	2,511,102	125,075	2,636,177
1900	2,658,207	144,025	2,802,232
1901	2,921,268	142,575	3,063,843
1902	3,124,916	167,174	3,292,090
1903	3,597,280	149,300	3,746,580

The figures shown for each quarter of the year 1903 are :—

	Coin. £	Bullion. £
March quarter, 1903	3,212,561	155,683
June „	3,405,536	192,710
September „	3,572,526	150,170
December „	3,597,280	149,300

In 1886 the average amount of advances made by the banks was £15,853,420, equal to £27·23 per head of the mean population. The advances gradually declined in amount and proportion to population until 1891, when they were in value £11,549,145, or £18·34 per head. In 1897 advances stood at £10,892,111, or £15·09 per head, which is the lowest average since the year 1872. From thence there was continuous rise both in amounts of advances and rates per head of population until 1903, for which the figures are £14,440,403, or £17·61 per head. The discounts in 1902 amounted to £1,814,639, or £2·27 per head of mean population, and in 1903 they were £1,893,808, or £2·31 per head. The largest amount of discounts in any year was £6,061,959 in 1879, a rate of £13·53 per head. From 1879 there was a fall year by year until 1896, when the sum was £1,756,791, or £2·49 per head.

An account of the special banking legislation of 1893 and its subsequent developments will be found in the previous issues of the Year-book. (See page 400, Year-book 1902.)

"The Bank of New Zealand Act, 1903."

This Act was passed in anticipation of guaranteed shares or stock issued under the authority of the Act of 1894, to the extent of two million pounds sterling, reaching maturity on the 19th July of the present year (1904), and of the expiry of the term of currency of the debentures issued by the Assets Realisation Board (31st March, 1904). It also makes provisions under which the remaining liability of the proprietors of the Bank, under section 21 of "The Banking Act, 1861," ranks as ordinary uncalled capital, and for the issue of fresh shares to the Government in lieu of the preferred shares originally issued to the Crown, but afterwards repurchased by the

BANKS OF ISSUE.

DEPOSITS, 1895 to 1903.

(Average of four quarters.)

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Bank. Besides the above, the Act deals with other matters affecting the business of the Bank and the Assets Realisation Board.

Ordinary Shares.

Every ordinary share in the Bank is deemed to be a share of the nominal value of £6 13s. 4d., paid up to the extent only of the amount actually paid on account of instalments of the call in respect of such share, leaving a liability of the balance of instalments, and the further liability of £3 6s. 8d. per share, but no more.

New Guaranteed Stock.

The guaranteed stock issued under "The Share Guarantee Act, 1894," to the extent of two million pounds, matured on the 19th July, 1904, and has been redeemed by the Bank, and a new issue of guaranteed stock, representing the sum of one million pounds sterling, having a currency not exceeding ten years, has been made in lieu thereof.

Preference Shares.

The preferred shares, representing £500,000 new capital, issued under the authority of "The Bank of New Zealand and Banking Act, 1895," and subsequently repurchased by the Bank, have been cancelled; and in lieu thereof the Government of New Zealand purchased 75,000 preference shares of the Bank, fully paid, representing £500,000 new capital. These shares rank for dividend purposes in priority to ordinary shares to the extent of 5 per cent. per annum (non-cumulative), and for dividends in excess of 5 per cent. they are entitled to only half the rate payable on ordinary shares; so that where, for example, the dividend on the ordinary shares is at the rate of 6 per cent., the dividend on the preference shares will be at the rate of 5½ per cent. The maximum rate of dividend payable on preference shares is 10 per cent., while that payable on ordinary shares is not limited. Otherwise the preference shares confer the same rights and privileges as ordinary shares.

Assets Realisation Board.

The Act empowers the Assets Board, for the purpose of redeeming such of its debentures as are outstanding at maturity, to issue fresh debentures, having a currency of five years, for a sum not exceeding in all the face value of the residue of the outstanding debt, and bearing interest at a rate not higher than 3½ per cent. per annum.

The properties vested in the Assets Board are to be valued at appointed times, and the actual deficiency between such value and the amount of outstanding debentures of the Board ascertained. When it is found that the assets of the Board are sufficient to meet its liabilities, the Governor may by Order in Council declare that the Board shall cease to exist, its properties being handed over to the Bank, which thereupon is to redeem all the outstanding debentures of the Board.

Other Provisions.

December and June, as the dates for holding the half-yearly and annual meetings, are substituted for February and August. Special provision for voting at elections of directors (by papers forwarded and returned through the post) is made, and the date of election of the chairman is altered from January to April.

Savings-banks.

The number of post-offices open for the transaction of savings-bank business at the end of 1903 was 493.

There were 57,047 new accounts opened in the year, and 40,837 accounts were closed. The total number of open accounts at the end of 1903 was 243,675, or 1 in every 3·42 of the population.

The deposits received during the year amounted to £5,661,592 15s. 2d., and the withdrawals to £5,343,828 5s., the excess of de-

posits over withdrawals having thus been £317,764 10s. 2d. The total sum standing at credit of all accounts on the 31st December, 1903, was £7,388,681 18s. 7d., which gave an average of £30 6s. 5d. to the credit of each open account.

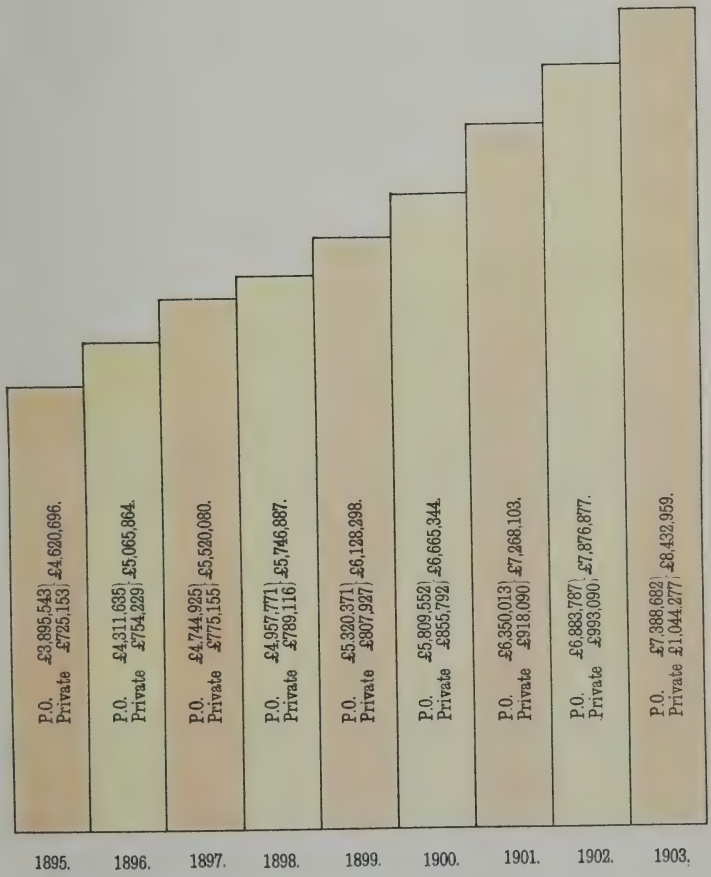
The number of open accounts (as on the 31st December) for the last five years are classified according to amounts at credit of each:—

	1899.	1900.	1901.	1902.	1903.
Not exceeding £20	133,851	142,368	153,593	161,989	174,563
Exceeding £20 and up to £50	20,206	22,333	23,743	25,520	26,887
" £50 " £100	12,286	13,704	14,705	16,621	17,592
" £100 " £200	10,403	11,173	12,797	14,657	15,589
" £200 " £300	3,915	5,151	4,765	5,473	5,499
" £300 " £400	1,145	1,238	1,394	1,619	1,795
" £400 " £500	654	773	768	860	905
" £500	586	668	671	726	845
Totals	183,046	197,408	212,436	227,465	243,675

The following were the securities, &c., standing in the name of the Postmaster-General on account of the Post-Office Savings-Bank Fund on the 31st December, 1903:—

Description of Securities.	Nominal Value.			Value at Cost Price.		
	£	s.	d.	£	s.	d.
"Aid to Public Works and Land Settlement Act, 1896," Debentures, 3½ per cent. ..	100,000	0	0	100,000	0	0
"Aid to Public Works and Land Settlement Act, 1899," Debentures, 3½ per cent. ..	125,000	0	0	125,000	0	0
Aid to Public Works and Land Settlement Acts, 1896 and 1897, Debentures, 3 per cent. ..	65,000	0	0	65,000	0	0
"Aid to Public Works and Land Settlement Act, 1902," Debentures, 4 per cent. ..	100,000	0	0	100,000	0	0
"Consolidated Loan Act, 1867," Debentures, 4 per cent.	13,000	0	0	12,480	0	0
"Consolidated Stock Act, 1884," Debentures, 3½ per cent.	689,700	0	0	689,700	0	0
"Dairy Industry Act, 1898," Debentures, 3½ per cent.	1,781	0	0	1,781	0	0
"Defence and other Purposes Loan Act, 1870," Debentures, 4 per cent.	75,000	0	0	72,000	0	0
"Defence and other Purposes Loan Act, 1870," Debentures, 4½ per cent.	8,100	0	0	8,100	0	0
District Railways Purchasing Acts, 1885 and 1886, Debentures, 4 per cent.	42,000	0	0	36,076	17	8
District Railways Purchasing Acts, 1885 and 1886, Scrip, 4 per cent.	34,100	0	0	34,100	0	0
Dunedin Garrison Hall Debentures, 5 per cent.	6,000	0	0	6,000	0	0
"General Purposes Loan Act, 1873," Debentures, 4 per cent.	5,200	0	0	4,342	0	0
"Government Advances to Settlers Extension Act, 1901," Debentures, 3½ per cent. ..	80,000	0	0	80,000	0	0
"Government Loans to Local Bodies Act, 1886," Debentures, 3½ per cent.	231,500	0	0	231,500	0	0
Greymouth Harbour Board Debentures, 4 per cent.	120,000	0	0	120,000	0	0
Hamilton Borough Debentures, 4½ per cent...	3,000	0	0	3,000	0	0
Hokitika Harbour Board Debentures, 5 per cent.	10,000	0	0	10,000	0	0

SAVINGS-BANKS.
(POST-OFFICE AND PRIVATE.)
AMOUNTS TO CREDIT OF DEPOSITORS AT END OF YEAR, 1895 to 1903.



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Description of Securities.	Nominal Value.			Value at Cost Price.		
	£	s.	d.	£	s.	d.
"Immigration and Public Works Loan Act, 1870," Debentures, 4 per cent.	174,200	0	0	167,272	0	0
"Immigration and Public Works Loan Act, 1870," Debentures, 4½ per cent.	20,900	0	0	20,527	10	0
"Immigration and Public Works Loan Act, 1870," Debentures, 4 per cent. (Imperial guaranteed)	400,000	0	0	400,000	0	0
Inscribed Stock, 3 per cent.	2,134,940	0	0	2,129,614	0	0
"Land for Settlements Act, 1894," Debentures, 3½ per cent.	731,066	0	0	731,066	0	0
Land for Settlements Act Debentures, 3½ per cent.	62,000	0	0	62,000	0	0
"Lands Improvement and Native Lands Acquisition Act, 1894," Debentures, 4 per cent.	264,000	0	0	264,000	0	0
"Lands Improvement and Native Lands Acquisition Act, 1894," Debentures, 3½ per cent.	35,000	0	0	35,000	0	0
"Local Bodies' Loans Act, 1901," Debentures, 3½ per cent.	470,000	0	0	470,000	0	0
Oamaru Borough Consolidated Loan 1893 Debentures, 5 per cent.	13,800	0	0	13,800	0	0
Oamaru Harbour Bonds, 5½ per cent. ..	31,000	0	0	31,000	0	0
Patea Harbour Board Debentures, 4½ per cent.	21,870	0	0	21,870	0	0
"State Coal-mines Act, 1901," Debentures, 3½ per cent.	92,000	0	0	92,000	0	0
Thames Harbour Board Debentures, 4 per cent.	10,000	0	0	10,000	0	0
"Public Revenues Act, 1893" (Treasury Bills), 3½ per cent.	749,200	0	0	749,200	0	0
Westport Harbour Board Debentures, 4 per cent.	489,500	0	0	489,500	0	0
Totals	7,408,857	0	0	7,385,929	7	8

Most of this fund is invested in securities of the New Zealand General Government. Summarising the figures shows the investments to be:—

	£
In New Zealand Government securities	6,703,687
In local bodies' securities	699,170
In other securities	6,000
Total	£7,408,857

There are five savings-banks in the colony not connected with the Post Office. The total amount deposited in them in 1903 was £853,786 13s. 6d., of which the deposits by Maoris comprised £180. The withdrawals reached the sum of £832,739 11s. 5d., or less than the total deposits by £21,047 2s. 1d. The total amount to the credit of the depositors at the end of the year was £1,044,276 14s. 6d., of which sum £208 19s. 5d. belonged to Maoris.

Summary of all Deposits.

If the total deposits in the banks of issue at the end of the year be assumed to be equal to the average deposits for the four quarters of the year, then it may be affirmed that, exclusive of Government

moneys, the deposits in the said banks of issue and in the two classes of savings-banks amounted at the end of 1903 to £27,444,073. In addition, there are the deposits with building societies, which in 1902 were £328,323, and it is known that there were also deposits with financial companies of which no particulars have been supplied. The known deposits reach an average of £33 7s. 2d. per head of the population, exclusive of Maoris.

Building Societies.

There were 71 registered building societies in operation in the colony at the end of 1902. Of these, 39 were terminable societies, the rest were permanent.

The total receipts by these societies during their financial year were £840,843, of which deposits comprised £341,197.

The assets at the end of the year were valued at £1,367,000. The liabilities were: To shareholders, reserve fund, &c., £1,013,095; to depositors, £328,323; and to bankers and other creditors, £25,582.

Joint-stock Companies.

During the year ended 31st December, 1903, 197 joint-stock companies, with a total nominal capital of £2,555,509, and two guarantee companies, were registered under the provisions of "The Companies Act, 1882."

District where registered.	Companies registered in 1903. No.	Nominal Capital. £
Auckland	50	722,720
Taranaki	4	20,000
Hawke's Bay	8	102,450
Wellington	54	693,000
Marlborough	2	15,000
Nelson	3	11,000
Westland	5	45,500
Canterbury	23	529,250
Otago	41	265,589
Southland	7	151,000
Totals	197	2,555,509

Friendly Societies.

The Registrar of Friendly Societies received returns for the year 1902 from 462 lodges, courts, tents, &c., of various friendly societies throughout the colony. The number of members at the end of 1902 was 43,408.

The total value of the assets of these societies was £846,315, equivalent to £19 9s. 11d. per member. Of the total assets, the value of the sick and funeral benefit funds was £774,533.

The receipts during the year on account of the sick and funeral funds amounted to £111,388, and the expenditure to £74,563, of which the sick-pay to members reached the sum of £46,912. In addition to the sick-pay, the sum of £39,848 was paid out of the

medical and management expenses fund for attendance given and medicine supplied to the members and their families.

The Registrar of Friendly Societies has supplied particulars of the number of members of friendly societies, the amount of their accumulated capital, and the average capital per member in Australasia, according to the latest published statistics, arranged in order of membership :—

State or Colony.	Date of Return.	Number of Lodges.	Number of Members.	Amount of Funds.	Capital per Member.
				£	£ s. d.
Victoria	31st Dec., 1902	1,146	102,364	1,415,525	13 16 1
New South Wales ..	" 1900	790	75,027	693,366	9 4 10
New Zealand ..	" 1902	462	43,408	846,315	19 9 11
South Australia ..	" 1899	474	43,043	535,198	12 8 8
Queensland ..	" 1902	385	31,709	290,919	9 3 6
Tasmania	" 1901	149	14,716	114,309	7 15 4
Western Australia ..	" 1902	169	11,746	59,209	5 0 10

New Zealand shows by far the highest average of capital per member, Victoria and South Australia following, but not closely, while the averages of New South Wales, Queensland, Tasmania, and Western Australia are less than half the sum shown for this colony.

Mortgages.

In a return laid before the House of Representatives it is stated that during the year ended 31st March, 1903, mortgages to the value of £8,692,218 were registered in the several land registration districts of the colony, while the monetary value of those paid off amounted to £4,866,033. Compared with a similar return for the year 1901–1902 the mortgages registered show an increase of £435,305, the total amount for the earlier year having been £8,256,913.

The total amounts represented in the mortgages registered and paid off in each registration district during 1901–1902 and 1902–1903 were :—

District.	1901–1902.		1902–1903.	
	Mortgages registered.	Mortgages paid off.	Mortgages registered.	Mortgages paid off.
	£	£	£	£
Auckland ..	768,556	596,475	914,871	363,389
Poverty Bay ..	254,649	184,839	282,219	129,449
Taranaki ..	781,287	688,165	1,140,155	538,197
Hawke's Bay ..	866,311	452,948	720,333	424,385
Wellington ..	2,042,942	1,411,388	2,433,034	1,203,292
Marlborough ..	242,866	156,143	103,788	35,919
Nelson ..	145,104	87,927	162,893	67,025
Westland ..	36,950	22,033	38,076	25,947
Canterbury ..	1,932,005	1,651,569	1,808,485	1,401,255
Otago ..	661,035	409,536	570,991	388,275
Southland ..	525,208	263,345	517,373	288,900
Totals ..	£8,256,913	£5,924,368	£8,692,218	£4,866,033

Classified according to the various rates of interest, the amounts in the mortgage deeds registered during the two years were :—

1901–1902. £		1902–1903. £		Rate of Interest.
119,626	..	70,696	..	at 4 per cent. or under.
1,876,506 (*a*)	..	1,884,721 (*c*)	..	at 4½ per cent.
79,994 (*b*)	..	142,105	..	at 4¾ per cent.
2,889,148	..	2,786,574	..	at 5 per cent.
13,435	..	67,425 (*d*)	..	at 5¼ per cent.
481,913	..	556,449 (*e*)	..	at 5½ per cent.
4,895	..	16,450	..	at 5¾ per cent.
651,315	..	803,179	..	at 6 per cent.
590	..	500	..	at 6¼ per cent.
84,736	..	120,865	..	at 6½ per cent.
450	..	6,000	..	at 6¾ per cent.
244,891	..	299,548	..	at 7 per cent.
40,902	..	18,672	..	at 7½ per cent.
193,757	..	181,732	..	at 8 per cent.
95,005	..	96,216 (*f*)	..	at 8½ per cent. and over.
1,475,075	..	1,639,739	..	at rates not specified.
4,675	..	1,347	..	free.
£8,256,913		£8,692,218		

(*a*.) Including £12,000 at 4$\frac{3}{13}$ per cent., £14,000 at 4$\frac{5}{16}$ per cent., and £150 at 4⅓ per cent. (*b*.) Including £6,500 at 4⅝ per cent. (*c*.) Including £3,000 at 4⅓ per cent. (*d*.) Including £560 at 5$\frac{1}{10}$ per cent., and £1,600 at 5⅛ per cent. (*e*.) Including £2,350 at 5⅓ per cent. (*f*.) Including £60 at 8⅓ per cent.

Comparison of the foregoing with the amounts at the various rates of interest in the mortgages registered during 1895–96 shows the lowering of the rates that has taken place :—

Year 1895–96. £			
26,285	..	..	in small sums at less than 5 per cent.
833,226	..	..	at from 5 per cent. to 5¼ per cent.
732,764	..	..	at 5⅓ per cent.
116,600	..	..	at 5¾ per cent.
1,372,261	..	..	at from 6 per cent. to 6¼ per cent.
371,896	..	..	at from 6½ per cent. to 6¾ per cent.
599,542	..	..	at from 7 per cent. to 7¼ per cent.
111,651	..	..	at 7½ per cent.
382,348	..	..	at 8 per cent.
173,416	..	..	in small sums, at rates above 8 per cent.
853,801	..	..	at rates which are not specified.
£5,573,790			

The total amount shown in deeds as secured by mortgage under the Land Transfer Act on 31st March, 1903, was £42,906,772, as against £40,587,169 in March, 1902, £37,767,650 in March, 1901, £35,303,728 in March, 1900, £33,035,337 in March, 1899, £32,152,288 in March, 1898, and £31,112,921 in March, 1897; but in respect of some transactions the same money may be included more than once.

Life Insurance.

There were existing in the colony at the close of the year 1902 99,908 life insurance policies, an average of 124 in every 1,000 persons living. The gross amount represented by these policies was £24,697,807, an average of £247 4s. 1d. for each policy, and of £30 11s. 5d. for every European inhabitant of the colony at the end of the year.

The distribution of these policies shows that nearly one-half are held in the Government Life Insurance Department:—

Name of Office.	Number of Years of Business in the Colony.	New Zealand Business only.	
		Number of Existing Policies at End of Year 1902.	Gross Amount insured by Policies at End of Year 1902.
			£
Australian Mutual Provident Society	41	29,544	8,015,240
Australian Widows' Fund Life Assurance Society (Limited) ..	5	1,867	485,883
Citizens' Life Assurance Company (Limited)	9	3,832	566,569
Colonial Mutual Life Assurance Society (Limited)	19	4,594	1,198,870
Equitable Life Assurance Society of the United States	18	1,804	651,397
Mutual Life Association of Australasia	26	6,448	1,603,864
National Mutual Life Association of Australasia (Limited)	23	8,918	2,095,915
New York Life Insurance Company ..	16	424	162,797
Scottish Metropolitan Life Assurance Company (Limited)	6	21	8,700
Yorkshire Insurance Company ..	1	50	12,000
Life Insurance Department of the New Zealand Government ..	33	42,406	9,896,572
Totals, December, 1902 ..	..	99,908	£24,697,807
Totals, December, 1901 ..	..	94,429	£23,567,427

The rate at which life insurance increased is evidenced by the difference between the amounts insured at the end of each of the two years 1901 and 1902, being a sum of £1,130,380, or 4·80 per cent., while for the same twelve months population increased by 2·57 per cent. only.

Industrial Life Assurance.

In addition to the ordinary life insurance transactions alluded to above, there were in 1902 two industrial life assurance offices doing business in New Zealand. The number of policies in existence and the gross amount insured by such policies at the end of the year were:—

Name of Office.	Number of Years of Business in the Colony.	New Zealand Business only.	
		Number of Existing Policies at End of Year 1902.	Gross Amount insured by Policies at End of Year 1902.
			£
The Citizens' Life Assurance Company (Limited)	9	17,794	379,147
The Provident and Industrial Insurance Company of New Zealand.. ..	13	9,624	253,231
Totals, December, 1902 ..	..	27,418	£632,378
Totals, December, 1901 ..	..	26,111	£570,792

Here an increase of £61,586, or 10·79 per cent., is shown to have taken place in twelve months.

"The Government Accident Insurance Act, 1899."

By this statute the Commissioner of Life Insurance is given power to insure persons against accident, and specially employers against liability for accident to any person employed, besides generally doing the business of an insurer against accident.

The Act provides for capital for the accident insurance business by empowering the Governor in Council to raise by debentures or scrip, or by issue of inscribed stock, sums of money not exceeding £25,000 altogether. To redeem at maturity the securities issued in respect of capital raised there are provisions for a sinking fund.

The funds, assets, and liabilities of the Government Life Insurance Department belonging to its accident insurance branch are to be kept separate and distinct from the main life insurance business, and powers are vested in the Governor to make regulations in regard to tables fixing rates of premiums, and other details, for the conduct of accident insurance.

The income and expenditure for the years 1902 and 1903 were :—

Year.	Income.			Expenditure.			
	Premiums.	Other Receipts.	Total.	Claims.	Management.	Other Expenses.	Total.
	£	£	£	£	£	£	£
1902	14,100	70	14,170	7,364	5,836	40	13,240
1903	24,381	68	24,449	13,230	6,450	10	19,690

A sum of £5,450 is held as a reserve on account of claims accrued but unsettled (included above) on the 31st December. The unearned premium reserve fund now stands at £8,530, and the funds at £1,255.

The Public Trust Office.

This institution was described in full detail in the Year-book for 1898, page 454.

Classifying the business as on the 31st March, 1903 and 1904, the results are :—

	1903.		1904.	
	Number of Estates.	Value of Estates. £	Number of Estates.	Value of Estates. £
Wills and trusts (including sinking funds accounts)	744	1,279,743	836	1,605,143
Intestate estates	989	197,368	1,062	232,695
Real estates	71	7,585	*	*
Lunatic estates	802	170,585	854	208,573
Native reserves	143	375,000	119	380,000
West Coast Settlement Reserves ..	312	655,000	333	700,000
Unclaimed lands	253	21,504	266	26,471
Total	3,314	£2,706,785	3,470	£3,152,882

The capital funds of the Public Trust Office invested amounted, on the 31st March, 1904, to £1,595,330. The investments are as follow :—

	£
New Zealand Government securities	103,363
Local bodies' debentures	44,729
Mortgages of freehold property	1,447,238
Total	£1,595,330†

* Real estates now merged in unclaimed lands. † £500,000 held under "The Bank of New Zealand and Banking Act, 1895," was transferred during the course of the year by the Public Trustee to the Bank in terms of "The Bank of New Zealand Act, 1903."

Private Wealth.

The number and value of estates of deceased persons finally certified on which duty was paid during the years 1901, 1902, and 1903 are shown, classified according to amount :—

Value of Estates.	1901.		1902.		1903.	
	Number of Estates.	Aggregate Value on which Duty was paid.	Number of Estates.	Aggregate Value on which Duty was paid.	Number of Estates.	Aggregate Value on which Duty was paid.
£ £		£		£		£
Under 500 ..	856	158,551	768	161,471	741	151,164
500 to 1,000 ..	225	163,186	254	176,148	229	164,444
1,000 „ 2,000 ..	159	232,961	167	239,166	155	217,194
2,000 „ 3,000 ..	54	130,069	84	208,451	76	186,015
3,000 „ 4,000 ..	33	113,269	36	126,275	51	176,998
4,000 „ 5,000 ..	29	125,701	26	117,013	23	105,407
5,000 „ 7,500 ..	30	181,849	39	235,539	26	157,195
7,500 „ 10,000 ..	29	248,644	17	148,727	25	217,194
10,000 „ 15,000 ..	18	227,423	19	223,970	28	345,848
15,000 „ 20,000 ..	10	167,620	4	68,859	8	148,683
20,000 and over ..	14	603,425	25	1,008,618	23	1,221,198
Totals ..	1,457	2,352,698	1,439	2,714,237	1,385	3,091,340

In 1903 the estates of females on which duty was paid numbered 316, valued at £317,648, giving an average of £1,005 each. The estates left by males in 1903 numbered 1,069, valued at £2,773,692, an average of about £2,595 for each estate.

The number of estates admitted to probate and the number of adult deaths in each year 1898 to 1903 are given, and it will be seen that 25 out of every 100 adults who died during the year 1903 left property subject to estate duty.

Year.	Number of Estates.	Number of Adult Deaths.	Proportion per Cent. of Adults who died leaving Property on which Duty paid.
1898	1,287	4,696	27·41
1899	1,327	4,719	28·12
1900	1,345	4,683	28·72
1901	1,457	5,134	28·38
1902	1,439	5,413	26·58
1903	1,385	5,515	25·11

The private wealth of the colony has been estimated as for the year 1903, calculating on the assumption that the wealth of the living is proportionately equal to that left by the dead.

Taking the average for a term of years gives the following results:—

Years, inclusive.	Amount on which Duty paid.	Total Number of Deaths.	Average Amount left by each Person.	Average Number of Persons living.	Average Total Wealth for each Year of the Period.
	£		£ s. d.		£
1899–1903	12,139,701	39,416	307 19 9	781,911	240,819,987

Applying the average amount left by each person during the five years to the population on the 31st December, 1903 (832,505 persons), gives a total of wealth amounting to £256,402,400.

The above calculation has given results decidedly higher than would be shown if the adult population and adult deaths only were used, instead of the totals at all ages.

If what is believed to be the value of real estate privately owned be deducted from the total private wealth as given above, the remainder, being private personal property, represents what has certainly grown immensely in value since 1888, when an estimate was made while the property-tax was in operation.

The evidence by way of comparison of the yield of income-tax for 1892–93 and that for 1903–1904 helps towards forming an approximate estimate of what should be added to the private personal wealth by way of increase since 1888, and tends to confirm the higher figures referred to above.

And it must be remembered in connection with the above calculation that no allowance is made in using the figures for estates on which no stamp duty is payable, lands and goods passing to the husband or wife of deceased, and a great number of properties under £100.

Moreover, making the calculation on the deaths and population of persons from 21 years and upwards is open to the objection of arbitrariness; and females might have been treated as only leaving on an average about one-half what is left by males. By endeavouring to refine on the original method the troubles seem to increase, and, after all has been done that is possible, the result can only be put forward as a rough approximation to the facts.

As regards comparisons with Victoria or New South Wales, New Zealand, having a lower mortality of children than those States of the Australian Commonwealth, makes a calculation based on adult deaths disadvantageous to this colony.

The figures for each of the last eleven years are :—

ESTIMATED PRIVATE WEALTH.

Year.	Amount. £	Average per Head. £
1893	156,058,273	232
1894	154,715,821	225
1895	152,918,021	219
1896	170,007,843	238
1897	183,781,780	252
1898	201,154,323	271
1899	217,587,481	288
1900	228,236,158	296
1901	229,587,916	291
1902	240,054,835	297
1903	256,402,400	308

The above estimates of private wealth may be considered as *net* wealth, because stamp duty is paid after subtracting liabilities on estates.

The Government Statistician of New South Wales estimated the private wealth of the Commonwealth of Australia for the year 1901 at £908,762,000, an average of £243 per inhabitant. Mr. Coghlan remarks (page 306, "A Statistical Account of Australia and New Zealand, 1902–1903") that these "figures show a considerable reduction on those for 1890, when the average was not less than £309 per inhabitant," so that the figures for 1903 in respect of New Zealand show that here the average has just been reached that obtained in Australia before the great difficulties caused by financial reverses and drought.

An attempt to arrive at the value of the public property (exclusive of lessees' interests in land and improvements) in the colony, with the assistance of the Valuer-General, has led to the following result:—

PUBLIC PROPERTY, 1903.

Public property—*i.e.*, land and improvements not owned by individuals, exclusive of Government railways:—

	£	£
Crown lands	15,303,184	
Local authorities' lands	4,319,539	
Educational lands	3,181,739	
Church and other lands	2,249,378	
		25,053,840
Government railways, open and under construction, 31st March, 1903		20,366,000
Other public works—viz., telegraphs, lighthouses, harbours, and water-supply on goldfields		4,916,771
Total public property		£50,336,611

This amount of £50,336,611, with the sum of £256,402,400 previously shown as the private wealth, estimated from probate returns, gives a total of £306,739,011. If to this be added £7,500,000, the value of Native lands with their improvements (exclusive of lessees' interests), a final total of £314,239,011 is reached.

As before stated, so much of this sum as represents private wealth may be considered as *net* wealth, because stamp duty is paid after subtracting liabilities on estates. But the debt of the General Government and that of the local bodies (so far as raised abroad) must be deducted. The amounts were, in the year 1903, £48,460,466 and £5,336,600 respectively. Allowing for these, it is found that the colony had in 1903 at least £260,441,945 value of public and private wealth. Full information as to public wealth other than property owned by the Government is not procurable.

EARNINGS, INCOME, WAGES, AND COST OF LIVING.

Such calculations as have been made on the above subjects are referred to in the Year-book of 1903 on page 461.

ANNUAL CONSUMPTION OF FOOD, STIMULANTS, ETC.

The quantities used per head of population in New Zealand of some of the main articles of consumption will be found in the Year-book for 1898. The figures are averages for five years.

RATES OF WAGES.

The average rates of wages paid in 1903 in each provincial district for agricultural, pastoral, artisan, and servants' labour are given on pages 323 to 325.

AVERAGE PRICES OF PRODUCE, LIVE-STOCK, PROVISIONS, ETC., IN EACH PROVINCIAL DISTRICT OF NEW ZEALAND DURING THE YEAR 1903.

Produce, &c.	Auckland.	Taranaki.	Hawke's Bay.	Wellington.	Marlborough.	Nelson.	Westland (Goldfield).	Canterbury.	Otago (Part Goldfield).
I. AGRICULTURAL PRODUCE.									
Wheat .. .. per bushel (60lb.)	4/ to 5/	3/9 to 5/6	3/9 to 4/6	4/ to 5/	4/	4/	3/6 to 5/	3/3 to 4/	3/ to 4/6
Barley .. .. per bushel (47lb.)	3/ to 4/6	3/ to 4/	2/9 to 4/6	3/ to 4/6	4/	4/	4/6	2/9 to 3/6	2/6 to 3/6
Oats .. .. per bushel (40lb.)	1/10 to 3/	2/3 to 3/9	1/10 to 2/3	2/ to 2/6	2/2	2/3	2/3 to 2/6	1/6 to 2/6	1/6 to 2/9
Maize .. .. per bushel (56lb.)	2/6 to 5/	3/6 to 6/	3/ to 4/	3/6 to 5/6	..	4/ to 4/6	3/10 to 4/	3/6 to 4/	3/6 to 5/6
Bran .. .. per bushel (20lb.)	10d. to 1/9	1/ to 1/6	10½d. to 1/2	11d. to 1/6	..	1/	1/ to 1/3	9d. to 1/	8d. to 1/3
Hay .. .. per ton ..	£3/5 to £5	£3 to £4/15	£3/10 to £4/10	£3/10 to £5	£3	£4	£4 to £4/10	£2/10 to £3/15	£2/5 to £3/5
II. FLOUR AND BREAD.									
Flour, wholesale .. per ton of 2,000lb.	£10/5 to £12	£10 to £15	£9 to £10/15	£9 to £11	£10/10	200/ to 210/	£10 to £11	£9/5 to £10	£9/10 to £11
Flour, retail .. per bag of 50lb. ..	6/3 to 6/6	7/ to 9/	5/9 to 6/6	5/ to 6/9	6/3	6/	6/ to 7/	5/2 to 5/6	5/3 to 6/6
Bread .. .. per 4lb. loaf ..	7d.	7d.	7d.	7d.	8d.	7d.	7d. to 8d.	5d. to 7d.	6½d. to 8d.
III. LIVE-STOCK AND MEAT.									
Horses, draught .. per head ..	£25 to £40	£40	£30 to £50	£30 to £60	£25 to £50	£60	£45 to £60	£30 to £62	£35 to £50
Horses, saddle and harness .. .. per head ..	£7 to £22	£18 to £20	£12 to £20	£8 to £35	£15 to £25	£20	£15 to £30	£10 to £25	£15 to £30
Cattle, fat .. per head ..	£7 to £12	£7 to £9	£8/10 to £10	£8/10 to £11	£6 to £10	£7/10	£10 to £14	£7 to £12	£8/10 to £11
Cattle, milch cows .. per head ..	£5 to £9	£8 to £9	£6 to £9	£5 to £12	£6 to £8	£8	£6 to £9	£7/10 to £10	£6 to £9
Sheep, fat.. .. per head ..	18/ to 26/	12/ to 15/	12/ to 15/	13/6 to 19/	18/	15/	14/ to 22/6	15/ to £1	£1 to £1/5
Lambs, fat .. per head ..	12/ to 15/	10/	10/ to 13/	9/6 to 12/	12/ to 16/	12/	12/ to 16/	12/ to 17/	13/ to 18/
Butchers' meat:—									
Beef .. .. per lb.	5d. to 8d.	4½d. to 5d.	4½d. to 6d.	4d. to 7d.	7d.	5d. to 8d.	6d. to 8d.	4d. to 7½d.	5½d. to 8d.
Mutton .. .. per lb.	3½d. to 6d.	3½d. to 4d.	4d. to 5d.	3½d. to 6d.	3½d.	4½d. to 6d.	5d. to 7d.	4d. to 5d.	4d. to 7d.
Veal .. .. per lb.	4d. to 6d.	5d.	5d. to 6d.	3½d. to 6¾d.	6d.	5d.	6d. to 8d.	4½d. to 6d.	4½d. to 8d.
Pork .. .. per lb.	5d. to 7d.	5d. to 6d.	5d. to 6d.	6d. to 8d.	6d.	6d.	6d. to 8d.	6d. to 8d.	6d. to 8d.
Lamb .. .. per lb.	5d. to 8d.	5d. to 5½d.	4½d. to 7d.	5d. to 7d.	8d.	7d.	7d.	5d. to 7d.	4d. to 8d.
IV. DAIRY PRODUCE.									
Butter, fresh .. per lb.	10d. to 1/1	11d. to 1/	9d. to 1/	8d. to 1/	9d.	1/	1/	7d. to 1/	9d. to 1/2
Butter, salt .. per lb.	7d. to 10d.	9d. to 10d.	6d. to 9d.	8d. to 9d.	7d.	8d. to 11d.	10d. to 1/	7d. to 10d.	7d. to 1/
Cheese, colonial .. per lb.	6½d. to 8d.	6d.	8d.	6d. to 8d.	6d.	8d.	7d. to 8d.	6d. to 7d.	5½d. to 10d.
Cheese, imported .. per lb.	1/ to 2/6	..	1/6 to 2/	1/ to 2/	..	..	1/ to 1/6	8d. to 1/4	8½d. to 2/6
Milk .. .. per quart ..	3d. to 4d.	3d.	3d.	3d. to 4d.	4d.	4d. to 6d.	4d. to 6d.	3d. to 4d.	3d. to 6d.

AVERAGE PRICES OF PRODUCE, LIVE-STOCK, PROVISIONS, ETC., IN EACH PROVINCIAL DISTRICT OF NEW ZEALAND DURING THE YEAR 1903.
—continued.

Produce, &c.	Auckland.	Taranaki.	Hawke's Bay.	Wellington.	Marlborough.	Nelson.	Westland (Goldfield).	Canterbury.	Otago (Part Goldfield).
V. FARM-YARD PRODUCE.									
Geese .. per pair ..	7/ to 10/	8/ to 8/6	7/ to 9/	5/ to 7/6	7/6	7/6 to 10/	9/ to 10/	5/ to 7/6	5/6 to 10/
Ducks .. per pair ..	4/ to 6/	4/ to 5/	4/ to 6/	3/6 to 6/	5/	5/ to 7/6	5/ to 7/	5/ to 6/	4/6 to 6/
Fowls .. per pair ..	2/6 to 4/	3/6 to 4/	3/ to 5/	2/6 to 4/6	3/	3/6 to 5/	4/ to 6/	3/3 to 4/9	3/ to 4/
Turkeys .. per head ..	4/ to 8/	5/6 to 12/	5/ to 10/	5/ to 9/6	..	4/ to 7/6	6/ to 10/	7/ to 9/6	7/ to 12/
Bacon .. per lb. ..	7½d. to 10d.	9d. to 1/	8½d. to 10½d.	9d.	9d.	7½d. to 9d.	9d. to 10d.	6d. to 10d.	8d. to 10½d.
Ham .. per lb. ..	8½d. to 1/1	10½d. to 1/	10d. to 11d.	9d. to 1/	11d.	10d. to 11d.	10d.	9d. to 1/	9d. to 1/1
Eggs .. per doz. ..	8d. to 1/	1/ to 1/1	1/ to 1/4	10d. to 1/4	1/	1/2 to 1/6	1/3 to 1/6	10d. to 1/	9d. to 1/1
VI. GARDEN PRODUCE.									
Potatoes, wholesale per ton ..	70/ to 120/	60/ to 80/	50/ to 100/	60/ to 80/	55/	60/	60/ to 100/	40/	40/ to 120/
Potatoes, retail .. per cwt. ..	3/6 to 7/6	4/3 to 6/	3/6 to 6/	3/6 to 5/	5/	..	5/ to 6/	2/6	4/ to 8/
Onions .. per lb. ..	1½d. to 3d.	1d. to 1½d.	1½d. to 2d.	1d. to 3d.	2d.	2d.	1½d. to 2d.	1d. to 1½d.	1d. to 2d.
Carrots .. per doz. bnchs.	8d. to 2/	2/	9d. to 2/	1/ to 2/	1/	1/6	2/	1/ to 3/	1/ to 3/
Turnips .. per doz. bnchs.	8d. to 2/	2/	9d. to 2/	1/ to 2/	1/	1/6	2/	1/ to 3/	1/ to 3/
Cabbages .. per doz. ..	1/4 to 3/	1/3 to 4/	1/3 to 3/	1/ to 3/	2/6	9d. to 3/	3/ to 4/	1/ to 3/	8d. to 3/
VII. MISCELLANEOUS ARTICLES.									
Tea .. per lb. ..	1/8 to 2/6	2/	1/10 to 2/6	1/6 to 2/6	2/	2/	2/ to 3/	1/3 to 2/	1/8 to 2/
Coffee .. per lb. ..	1/4 to 2/	1/8	1/8 to 2/	1/6 to 2/	1/8	1/6 to 1/8	1/6 to 2/	1/4 to 2/4	1/6 to 2/
Sugar .. per lb. ..	2½d. to 3d.	2½d. to 3d.	2¾d. to 3½d.	2½d. to 3d.	3d.	2½d. to 3d.	3d.	2½d.	2½d. to 3d.
Rice .. per lb. ..	2d. to 3d.	2½d. to 3d.	3d.	2d. to 3d.	2d.	2½d.	3d.	2d. to 3d.	2d. to 3d.
Salt .. per lb. ..	1d.	1d.	1d.	1d.	1d.	1d.	1d.	1d.	1d.
Soap .. per cwt. ..	12/ to 27/	17/ to 20/	14/ to 25/	11/6 to 23/	21/	18/ to 30/	10/ to 24/	18/ to 20/	14/ to 24/
Candles .. per lb. ..	5d. to 8d.	6½d. to 8d.	6d. to 9d.	6d. to 8d.	6d. to 8d.	7d. to 8d.	6d. to 8d.	5d. to 7d.	6d. to 10d.
Tobacco .. per lb. ..	5/3 to 6/6	5/6	5/ to 6/	5/ to 6/	5/6 to 6/6	5/6 to 6/	5/ to 6/6	5/ to 6/6	5/ to 6/
Coal .. per ton ..	26/ to 50/	40/ to 42/	34/6 to 50/	34/ to 50/	40/	22/ to 40/	22/ to 35/	30/ to 52/	20/ to 40/
Firewood .. per cord ..	15/ to 30/	20/ to 25/	20/ to 30/	20/ to 33/	30/	..	18/ to 24/	30/ to 40/	17/6 to 40/
VIII. BEER, WINES, SPIRITS.									
Beer, colonial .. per hhd. ..	80/ to 96/	80/	85/ to 95/	70/ to 100/	84/	80/	80/ to 90/	80/	70/ to 100/
Beer, English, bottl'd per doz. qts. ..	13/ to 18/	15/	14/6 to 16/6	14/ to 18/	14/6	15/	14/ to 16/	13/6 to 18/	13/ to 18/
Brandy .. per gallon ..	24/ to 28/	30/ to 35/	27/ to 30/	26/6 to 32/6	28/	25/ to 27/6	25/ to 26/	28/ to 30/	23/ to 29/
Rum .. per gallon ..	22/6 to 27/	26/ to 27/6	23/ to 30/	24/6 to 28/	30/	22/6 to 26/	24/ to 25/	25/ to 30/	21/ to 27/
Whisky .. per gallon ..	24/ to 27/	27/6 to 30/	27/ to 30/	26/ to 30/	32/6	25/ to 27/6	25/	27/6 to 31/	23/ to 29/
Gin .. per gallon ..	19/ to 24/6	20/ to 24/	23/6 to 27/6	20/ to 30/	23/ to 25/	..	19/ to 24/	20/ to 24/	20/ to 33/
Wine, Australian .. per gallon ..	12/ to 17/	16/ to 18/	14/6 to 21/	14/ to 24/	17/6	15/ to 16/	13/6 to 20/	15/ to 16/	16/ to 30/
Wine, European .. per gallon ..	16/ to 28/	20/	22/ to 25/	20/ to 40/	25/	20/	17/6 to 27/	24/ to 28/	18/ to 36/

AVERAGE RATES OF WAGES IN EACH PROVINCIAL DISTRICT OF NEW ZEALAND DURING THE YEAR 1903.

Description of Labour.	Auckland.	Taranaki.	Hawke's Bay.	Wellington.	Marlborough.	Nelson.	Westland (Goldfield).	Canterbury.	Otago (Part Goldfield).
1. AGRICULTURAL LABOUR.									
Farm-labourers:									
With board, per week	15/ to 25/	20/	20/ to 25/	15/ to 30/	25/	20/ to 25/	20/ to 30/	15/ to 20/	15/ to 25/
Without board, per day	7/	7/	6/ to 8/	8/	7/	8/	..	5/ to 6/	6/ to 8/
Ploughmen:									
With board, per week	20/ to 25/	25/	20/ to 25/	20/ to 30/	25/	20/	20/ to 25/	20/ to 25/	17/6 to 25/
Without board, per day	7/6 to 8/	7/	6/ to 8/	8/	7/	8/	8/	5/ to 6/	7/
Harvesters:									
With board, per week	30/ to 35/	40/	30/	30/ to 40/	48/	40/	..	35/ to 40/	20/ to 30/
Without board, per day	8/ to 9/	1/ per hour	1/ per hour	8/	10/	10/	..	1/ per hour	9d. to 1/ per hour
Men cooks on farms									
With board, per week	20/ to 30/	20/ to 25/	25/ to 30/	20/ to 30/	25/	25/	..	20/ to 25/	20/ to 40/
Female farm-servants:									
With board, per week	10/ to 15/	10/ to 12/	12/ to 15/	10/ to 25/	12/	10/ to 15/	..	10/ to 15/	12/ to 20/
2. PASTORAL LABOUR.									
Shepherds, with board, per annum	£50 to £70	£50 to £80	£65 to £78	£50 to £80	£70 to £80	£65	..	£52 to £70	£52 to £85
Stock-keepers, with board, per annum	£50 to £70	£50 to £80	£60 to £78	£50 to £80	£70 to £80	£65	..	£52 to £65	£50 to £75
Station-labourers:									
With board, per week	15/ to 25/	20/ to 25/	20/ to 25/	10/ to 30/	20/ to 25/	20/	..	15/ to 20/	15/ to 22/
Without board, per day	..	..	..	..	..	..	..	5/ to 7/6	..
Shearers, with board, per 100 sheep shorn	16/8 to 20/	16/8 to 20/	17/6 to 20/	16/8 to 20/	16/8 to 20/	16/8	..	15/ to 17/6	15/ to 20/
Men cooks on stations, with board, per week	20/ to 30/	20/ to 30/	25/ to 30/	20/ to 40/	25/ to 30/	25/	..	20/ to 30/	20/ to 30/
3. ARTISAN LABOUR (per day, without board).									
Masons	10/ to 14/	12/	12/	10/ to 14/	10/	11/	12/ to 14/	10/ to 11/	10/ to 14/
Plasterers	10/ to 14/	12/ to 16/	14/	12/ to 15/	12/	11/	13/4 to 14/	11/ to 12/	11/ to 14/
Bricklayers	10/ to 14/	12/ to 12/8	12/	10/ to 14/	10/	11/ to 14/	12/ to 14/	12/	10/ to 13/

AVERAGE RATES OF WAGES IN EACH PROVINCIAL DISTRICT OF NEW ZEALAND DURING THE YEAR 1903—*continued.*

Description of Labour.	Auckland.	Taranaki.	Hawke's Bay.	Wellington.	Marlborough.	Nelson.	Westland (Goldfield).	Canterbury.	Otago (Part Goldfield).
3. ARTISAN LABOUR (per day, without board)—*continued.*									
Carpenters	9/ to 12/	10/	10/	9/ to 12/	8/	9/ to 12/	12/ to 14/	10/ to 10/8	10/ to 12/
Smiths	8/ to 10/	9/	10/	8/ to 10/	8/	9/ to 11/	10/ to 13/4	8/ to 10/	8/ to 10/6
Shipwrights	10/	10/	10/	10/ to 12/	..	12/	10/	10/ to 12/	10/ to 12/
Plumbers	8/ to 11/	9/ to 10/	10/ to 12/	9/ to 12/	10/	8/ to 10/	10/ to 13/6	9/ to 11/	10/ to 12/
Painters	7/ to 10/	9/ to 10/	9/ to 10/	8/ to 10/	10/	8/ to 10/	8/ to 12/6	8/ to 10/	9/6 to 12/
Saddlers	8/ to 10/	8/ to 9/	8/ to 9/	8/ to 9/	10/	8/	8/6 to 10/	8/ to 8/6	8/ to 10/
Shoemakers	7/ to 9/	8/	7/ to 8/6	7/6 to 9/	7/6 to 8/	8/	9/ to 10/	6/ to 8/	6/ to 10/
Coopers	8/ to 10/	8/ to 10/6	9/ to 10/	8/ to 10/	10/	10/	10/ to 12/	8/6 to 11/	8/ to 13/
Watchmakers	8/ to 12/	8/ to 10/	9/ to 10/	7/ to 10/	10/ to 12/	8/6 to 10/	10/ to 12/	8/ to 10/	9/ to 12/
Wheelwrights	9/ to 10/	9/ to 10/	10/	8/ to 10/	10/	9/	10/ to 12/	9/ to 12/	8/ to 12/6
4. SERVANTS.									
Married couples without family, with board, per annum	£60 to £85	£70 to £80	£75 to £90	£60 to £80	£60 to £90	£75	..	£65 to £80	£60 to £80
Married couples with family, with board, per annum	£52 to £80	..	£60 to £80	£50 to £80	£70 to £80	£70	..	£60 to £70	£45 to £80
Grooms, with board, per week ..	15/ to 25/	25/	20/ to 30/	20/ to 25/	25/ to 30/	20/ to 25/	20/ to 25/	20/ to 30/	20/ to 30/
Gardeners :									
With board, per week	20/ to 25/	20/ to 36/	20/ to 30/	20/ to 40/	20/ to 30/	25/	..	20/ to 30/	20/ to 30/
Without board, per day	7/	8/	7/	7/ to 8/	8/ to 10/	8/	8/	7/ to 8/	7/ to 8/
Cooks, with board, per week	15/ to 25/	20/ to 30/	15/ to 30/	12/6 to 40/	15/ to 21/	20/	15/ to 25/	12/ to 20/	12/ to 20/
Laundresses, with board, per week ..	15/ to 20/	15/ to 30/	13/ to 20/	15/ to 20/	15/ to 20/	15/	15/ to 20/	15/ to 20/	12/ to 25/
General house servants, with board, per week	10/ to 17/6	10/ to 15/	12/ to 15/	8/ to 20/	10/ to 15/	10/ to 15/	10/ to 15/	10/ to 15/	10/ to 15/
Housemaids, with board, per week ..	8/ to 15/	10/ to 15/	10/ to 15/	10/ to 24/	10/ to 15/	10/ to 15/	10/ to 15/	10/ to 12/6	10/ to 15/
Nursemaids, with board, per week ..	5/ to 10/	5/	6/ to 8/	5/ to 15/	7/ to 12/	8/	8/ to 11/	4/ to 10/	6/ to 10/

AVERAGE RATES OF WAGES IN EACH PROVINCIAL DISTRICT OF NEW ZEALAND DURING THE YEAR 1903—*continued.*

Description of Labour.	Auckland.	Taranaki.	Hawke's Bay.	Wellington.	Marl-b'rough.	Nelson.	Westland (Goldfield).	Canterbury.	Otago (Part Goldfield).
4. SERVANTS—*continued.*									
Needlewomen:									
With board, per week	12/ to 20/	12/ to 20/	..	20/	15/–20/	20/	12/ to 20/	15/ to 20/	15/ to 21/
Without board, per day (lunch always provided)	3/6 to 5/	3/	3/6	3/ to 5/	4/ to 5/	..	4/	3/ to 4/	3/ to 6/
5. MISCELLANEOUS.									
General labourers, without board, per day	7/ to 8/	8/	7/ to 8/	7/ to 9/	7/ to 8/	5/ to 8/	10/	6/ to 8/	6/ to 8/
Stonebreakers, without board, per cubic yard	4/ to 4/6	3/ to 3/9	2/6 to 3/6	2/6 to 3/6	3/6	..	4/6	2/6 to 3/6	2/3 to 3/6
Seamen, with board, per month ..	£6	..	..	£6 to £6/10	..	£6	£6	£4/10 to £6	£5 to £8
Miners, without board, per day	7/6 to 10/6	8/	..	..	9/	9/6 to 10/	9/6 to 10/	8/ to 10/	8/ to 11/
Engine-drivers, „ „	8/6 to 12/6	9/ to 10/	9/ to 12/	8/ to 12/	10/	10/	10/ to 12/	10/	8/ to 13/
Tailors, „ „	8/4 to 10/	6/8 to 10/	7/6 to 10/	7/ to 10/	10/–11/6	8/4 to 9/	10/ to 12/	9/ to 10/	6/8 to 11/8
Tailoresses, „ per week	16/ to 30/	15/ to 40/	20/ to 30/	15/ to 40/	..	20/ to 25/	25/ to 48/	24/ to 30/	21/ to 30/
Dressmakers, „ „	10/ to 25/	12/ to 36/	25/ to 40/	24/ to 50/	20/–30/	15/ to 50/	21/ to 24/	21/ to 25/	20/ to 30/
Milliners, „ „	10/ to 30/	20/ to 42/	25/ to 40/	30/ to 50/	20/–35/	30/ to 50/	40/ to 50/	21/ to 40/	20/ to 50/
Machinists, „ „	15/ to 30/	20/ to 42/	25/ to 30/	20/ to 50/	7/–20/	24/	15/ to 20/	21/ to 30/	17/6 to 30/
Storekeepers, „ „	40/ to 60/	30/ to 54/	50/ to 60/	30/ to 70/	45/–60/	50/ to 80/	50/ to 72/	39/ to 60/	40/ to 70/
„ assistants, „ „	24/ to 50/	36/	40/ to 50/	30/ to 60/	35/–40/	30/ to 60/	40/ to 50/	30/ to 40/	25/ to 60/
Drapers' assistants, „ „	24/ to 65/	36/ to 50/	30/ to 50/	25/ to 65/	40/–60/	40/ to 50/	40/ to 70/	30/ to 60/	20/ to 60/
Grocers' assistants, „ „	30/ to 60/	36/ to 50/	40/ to 50/	25/ to 60/	30/–35/	30/ to 50/	40/	30/ to 60/	20/ to 50/
Butchers, „ „	45/ to 50/	42/ to 48/	45/ to 60/	30/ to 70/	40/–50/	25/ to 40/	60/	40/ to 54/	30/ to 60/
Bakers, „ „	30/ to 54/	40/ to 50/	47/6 to 60/	40/ to 60/	50/–60/	50/	50/ to 60/	40/ to 60/	32/ to 60/
Storemen, „ „	42/ to 50/	45/	42/ to 50/	45/ to 55/	50/–60/	42/ to 50/	50/ to 60/	36/ to 48/	40/ to 60/
Compositors, „ „	45/ to 60/	48/ to 50/	42/ to 50/	40/ to 60/	50/–65/	50/ to 60/	50/ to 60/	40/ to 60/	40/ to 70/

SECTION XI.—MINING.

The natural mineral resources of New Zealand are very great, and have exercised in the past a most important influence on the development and progress of the colony. Gold to the value of £63,149,147 was obtained prior to the 31st December, 1903; the value of the produce for the year 1903 having been £2,037,831. In the earliest years the gold was obtained from alluvial diggings, but at the present time the greatest quantity is taken from gold-bearing quartz, which is distributed widely through several parts of the colony, and thus there is a much better prospect of the permanency of this industry than alluvial diggings alone could give.

The yield of silver to the end of 1903 amounted to £544,278 in value, the quantity mined in 1903 having been 911,914 oz., valued at £91,497.

Of other minerals, the value of the product to the same date amounts to £22,119,815, of which kauri-gum yielded £11,857,270, and coal, with coke, £9,962,997.

The quantities and values of precious metals and minerals obtained during the year 1903, and the total value of all mining produce since 1853, are:—

	1903.		Total Value since 1853.
	Oz.	£	£
Gold	533,314	2,037,831	63,149,147
Silver	911,914	91,497	544,278
	1,445,228	2,129,328	63,693,425
	Tons.		
Copper-ore ..	6	123	18,211
Chrome-ore ..	..	..	38,002
Antimony-ore ..	..	..	52,598
Manganese-ore ..	70	210	61,056
Hæmatite-ore ..	..	1	343
Mixed minerals ..	625	7,014	122,127
Coal	1,420,193	762,858	9,938,193
Shale	36	18	7,211
Coke (exported) ..	..	..	24,804
Kauri-gum ..	9,357	631,102	11,857,270
		£3,530,654	£85,813,240

Of the gold entered for exportation during the year ended the 31st March, 1904—viz., 540,445 oz., representing a value of £2,066,948—about 60 per cent. came out of quartz-mines; but, if the total yield of gold obtained in the colony be taken, the value of which to 31st March, 1904, is £63,628,261, about 25 per cent. came from quartz-mines and 75 per cent. from alluvial workings.

MINERAL PRODUCTION (VALUE) OF AUSTRALASIA TO END OF 1902.

The total value of mineral production for Australasia to the end of the year 1902 is shown in the following table. The figures, except those for New Zealand, are taken from Mr. Coghlan's "Statistics of the Six States of Australia and New Zealand":—

State or Colony.	Gold.	Silver and Silver-lead.	Copper.	Tin.	Coal.	Other Minerals.	Total.
	£	£	£	£	£	£	£
New S'th Wales	49,844,135	33,781,756	6,164,879	6,661,399	41,701,442	4,678,830	142,832,441
Victoria ...	263,556,405	862,289	206,395	715,998	1,198,208	411,661	266,950,956
Queensland ...	55,472,314	860,893	2,438,892	4,810,037	2,994,275	359,863	66,936,274
South Australia	2,483,276	138,390	23,212,021	38,758	...	575,118	26,447,563
W'st'n Australia	38,097,375	20,929	335,062	237,982	237,160	417,914	39,346,422
Tasmania... ...	5,195,161	2,771,910	4,609,478	7,482,901	474,065	384,141	20,917,656
New Zealand ...	61,111,316	452,781	18,088	...	9,175,335	11,525,066*	82,282,586
Australasia ...	475,759,982	38,888,948	36,984,815	19,947,075	55,780,485	18,352,593	645,713,898

*Inclusive of kauri-gum to the value of £11,226,163.

GOLD-MINING.

The history of the finding of gold in this colony was briefly sketched in the Year-books for 1893 and 1894, and need not, therefore, be given again, but the remarks of the *New Zealand Mines Record* on the great results for the year 1903 at Ohinemuri may well be quoted:—

Reviewing the history of the Auckland goldfields during 1903, generally, the most striking feature is the success of the Ohinemuri district, to which the large increase in the gold-output is solely due.

Operations at the parent mine of Waihi have been attended with gratifying results, the reef systems met with having produced considerable quantities of ore, the bulk of which has been payable, and some of it very rich. A considerable amount of work has been done in the low levels, and there are now large blocks of ground opened up, with ore in sight sufficient to insure the mine a long lease of life. The deep-sinking operations intended to be carried out by the Waihi Company have necessitated the purchase of a large amount of machinery, the installation of which is carried on as rapidly as possible. The latest importation is a winding plant that will enable 1,000 tons of ore per day to be raised—an increase of 600 tons per day. This should largely increase the returns. Efficient and economical methods of ore-treatment have enabled the company to bring their mine ahead of the great Mount Morgan Mine as to productiveness, and there is a reasonable prospect of it becoming in time of even more importance amongst the noted gold-mines of the world. Its yield of about £650,000 during 1903 is over £127,000 in excess of the total output for the previous year.

GOLD-DREDGING.

The year 1903 was not a favourable one for gold-dredging. The fluctuations in height of the River Molyneux were such as to

effectually prevent anything like constant work, even with dredges which had been improved for use in deeper water than formerly. Moreover, what are termed the gorge dredges could only be worked at intervals. With the river remaining steadily at a low level during the winter, good results may be obtained, but those were not the conditions for the year 1903.

Miners, and Gold entered for Export at different Districts.

The total number of gold-miners employed in 1903 was 10,210, as against 11,398 for the previous year. In some places, more especially in Otago, Nelson, and on the West Coast, many of the miners do not depend entirely on mining, but employ a part of their time in farming and other pursuits.

In 1901 an Act was passed reducing the fee payable for a miner's right from 10s. to 5s.

The total quantity of gold entered for export during the years ending 31st March, 1903, and 31st March, 1904, for the several districts, and the total quantity and value of the gold exported from the colony from the 1st January, 1857, to the 31st March, 1904, are shown hereunder; but this does not necessarily include the whole of the gold produced, as no doubt much has been taken out of the colony from time to time by people who have evaded the duty, and a good deal has been used for making jewellery and ornaments :—

Table showing the Quantity and Value of Gold entered for Exportation from New Zealand for the Years ended the 31st March, 1903 and 1904, and the Total Quantity and Value from January, 1857, to 31st March, 1904.

District.	Year ending 31st March, 1903.		Year ending 31st March, 1904.		Increase for Year ending 31st March, 1904.	Total Quantity and Value from January, 1857, to 31st March, 1904.	
	Quantity.	Value.	Quantity.	Value.			
	Oz.	£	Oz.	£	Oz.	Oz.	£
Auckland ..	203,158	724,892	233,271	834,070	30,113	3,288,733	12,232,414
Wellington..	..	..	..	..	..	188	706
Marlborough	401	1,604	1,279	5,073	878	88,779	345,975
Nelson ..	6,235	24,704	8,222	32,819	1,987	281,819	1,113,018
West Coast..	125,399	501,639	126,184	504,845	785	6,355,054	25,274,602
Canterbury..	..	..	..	..	..	123	483
Otago ..	192,079	771,892	171,489	690,141	−20,590*	6,216,208	24,661,063
Totals ..	527,272	2,024,731	540,445	2,066,948	13,173 Net.	16,230,904	63,628,261

* Decrease.

It will be seen from the above table that there was last year an increase in the export of gold of 13,173 oz. on the figures for the preceding twelve months.

Of the total quantity of gold entered for exportation last year Auckland contributed 43·16 per cent.; Marlborough, 0·24 per cent.; Nelson, 1·52 per cent.; West Coast, 23·35 per cent.; and Otago, 31·73 per cent.

Gold-production of Australasia.

The gold-yield of Australasia for the years 1898 to 1902 was as under:—

	1898. Oz.	1900. Oz.	1902. Oz.
Queensland	920,048	963,189	860,453
New South Wales ..	340,493	345,650	190,316
Victoria	837,257	807,407	777,738
South Australia ..	31,961	24,086	28,198
Western Australia ..	1,050,184	1,580,950	2,177,442
Tasmania	74,233	81,125	70,996
New Zealand	280,175	373,616	508,045
	3,534,351	4,176,023	4,613,188

The increase for the five-year period is 1,078,837 oz. The mint value of Australasian gold averages £3 16s. per ounce, and a comparison of value is therefore as follows: 1898, £13,430,533; 1900, £15,868,887; 1902, £17,530,114: increase, 1898 to 1902, £4,099,581.

Gold-production of the World for each of the Five Years 1897–1901.

(From a table compiled in the Government Statistician's Office, Perth, Western Australia.)

Countries and Continents.	1897.	1898.	1899.	1900.	1901.
Australasia.	Fine oz.	Fine oz.	Fine oz.	Fine oz.	Fine oz.
Western Australia	603,847	939,490	1,470,605	1,414,311	1,703,416
Victoria	765,365	788,429	789,368	751,211	731,276
Queensland	601,060	647,487	668,150	676,058	598,412
New Zealand	230,759	254,416	356,231	338,911	412,876
New South Wales	265,593	292,940	412,412	281,214	216,888
Tasmania	68,093	68,624	77,110	74,445	69,491
South Australia	28,285	22,377	18,633	19,418	21,946
New Guinea, &c.	5,890	5,627	10,402	7,560	8,693
Total ounces ..	2,568,892	3,019,390	3,802,911	3,563,128	3,762,998
Total value £	10,911,960	12,825,553	16,153,739	15,135,206	15,984,200

Gold-production of the World, 1897–1901—continued.

Countries and Continents.		1897.	1898.	1899.	1900.	1901.
Africa.		Fine oz.	Fine oz.	Fine oz.	Fine oz.	Fine oz.
The Transvaal		2,743,518	3,823,367	3,637,713	348,761	258,033
Other countries and colonies		48,479	57,579	130,257	194,049	256,449
Total ounces ..		2,791,997	3,880,946	3,767,970	542,810	514,482
Total value	£	11,859,649	16,485,211	16,005,319	2,305,710	2,185,381
America.						
United States of America ..		2,774,935	3,118,398	3,437,210	3,829,897	3,880,578
Canada		291,582	666,445	1,028,620	1,350,176	1,183,465
Mexico		481,362	587,548	281,471	455,204	499,725
Columbia		107,736	109,473	89,231	57,804	100,145
South America		394,584	414,114	493,456	563,045	584,786
Total ounces ..		4,050,199	4,895,978	5,329,988	6,256,126	6,248,699
Total value	£	17,204,152	20,796,793	22,640,350	26,574,334	26,542,786
Europe.						
Russia		1,073,798	1,073,525	1,083,543	1,072,434	1,253,592
Other European countries ..		214,280	203,844	203,446	230,400	210,873
Total ounces ..		1,288,078	1,277,369	1,286,989	1,302,834	1,464,465
Total value	£	5,471,407	5,425,919	5,466,782	5,534,087	6,220,652
Asia.						
British India		369,154	378,674	405,045	444,585	452,743
China		298,486	261,655	269,783	208,031	231,058
Other Asiatic countries ..		88,584	99,630	157,751	207,864	273,798
Total ounces ..		756,224	739,959	832,579	860,480	957,599
Total value	£	3,212,235	3,143,146	3,536,571	3,655,087	4,067,622
The World.						
Total ounces		11,455,390	13,813,642	15,020,437	12,525,378	12,948,243
Value, pounds sterling	£	48,659,403	58,676,622	63,802,761	53,204,424	55,000,641

Coal-mining.

The extent of the coal-measures in New Zealand will make coal-mining one of the large industries in the colony, especially on the west coast of the Middle Island, where bituminous coal exists equal, if not superior, in quality to coal of the same class in any part of the world.

The progressive increase in the output of coal from 1878 to the end of 1903 is shown below:—

Year.	Raised in the Colony.		Imported.	Total raised in the Colony and imported per Annum.	Exported (excluding Coal for Fuel by Ocean Steamers).	Total Consumption of Coal within the Colony.	Yearly Increase in Consumption within the Colony.
	Total.	Yearly Increase.					
	Tons.	Tons.	Tons.	Tons.	Tons.	Tons.	Tons.
1878 ..	162,218	..	174,148	336,366	3,921	332,445	..
1879 ..	231,218	69,000	158,076	389,294	7,195	382,099	49,654
1880 ..	299,923	68,705	123,298	423,221	7,021	416,200	34,101
1881 ..	337,262	37,339	129,962	467,224	6,626	460,598	44,398
1882 ..	378,272	41,010	129,582	507,854	4,245	503,609	43,011
1883 ..	421,764	43,492	123,540	545,304	7,172	538,132	34,523
1884 ..	480,831	59,067	148,444	629,275	6,354	622,921	84,789
1885 ..	511,063	30,232	130,202	641,265	2,371	638,894	15,973
1886 ..	534,353	23,290	119,873	654,226	2,862	651,364	12,470
1887 ..	558,620	24,267	107,230	665,850	12,951	652,899	1,535
1888 ..	613,895	55,275	101,341	715,236	27,678	687,558	34,659
1889 ..	586,445	-27,450*	128,063	714,508	39,290	675,218	12,340
1890 ..	637,397	50,952	110,939	748,336	33,404	714,932	39,714
1891 ..	668,794	31,397	125,318	794,112	29,093	764,019	49,087
1892 ..	673,315	4,521	125,453	798,768	28,169	770,599	6,580
1893 ..	691,548	18,233	117,444	808,992	24,288	784,704	14,105
1894 ..	719,546	27,998	112,961	832,507	25,449	807,058	22,354
1895 ..	726,654	7,108	108,198	834,852	26,151	808,701	1,643
1896 ..	792,851	66,197	101,756	894,607	27,974	866,633	57,932
1897 ..	840,713	47,862	110,907	951,620	26,639	924,981	58,348
1898 ..	907,033	66,320	115,427	1,022,460	18,348	1,004,112	79,131
1899 ..	975,234	68,201	99,655	1,074,889	14,146	1,060,743	56,631
1900 ..	1,093,990	118,756	124,033	1,218,023	36,699	1,181,324	120,581
1901 ..	1,227,638	133,648	149,764	1,377,402	77,563	1,299,839	118,515
1902 ..	1,362,702	135,064	127,853	1,490,555	110,666	1,379,889	80,050
1903 ..	1,420,193	57,491	163,923	1,584,116	97,461	1,486,655	106,766

* Decrease.

It will be seen from the above that, with the exception of 1889, there has been a steady increase in the output of coal from the mines in the colony year after year since records have been kept by the Mines Department. The yearly increase in output is principally due to the growing demand for consumption within the colony. During a period of twenty-six years the annual consumption of coal in New Zealand has increased to the extent of 1,154,210 tons, showing that new industries are quickly springing up, requiring fuel for generating motive power.

The total output from the mines last year was 1,420,193 tons, as against 1,362,702 tons for 1902, an increase of 57,491 tons. The coal imported from other countries was 163,923 tons, against 127,853 tons in 1902, an increase in the importation last year of 36,070 tons. The imports were 163,903 tons from New South Wales, and 20 tons from the United Kingdom. The total export of coal

was 156,136 tons, of which 152,332 tons were colonial produce, and 3,804 tons imported coal from other countries. Of the coal exported, 58,675 tons were for coaling direct steamers trading between the colony and the United Kingdom, and has been treated as coal consumed within the colony, these steamers trading wholly between New Zealand and Great Britain. Taking, therefore, the output from the mines and the coal imported, there is a total of 1,584,116 tons, of which 97,461 tons were exported, leaving the consumption within the colony last year 1,486,655 tons, as against 1,379,889 tons for 1902, an increased consumption of 106,766 tons.

The largest increase in the output last year was in the Westport district—namely, 42,844 tons. There was also an increased production from the mines in the Kawakawa and Hikurangi district of 11,078 tons, in the Southland district of 9,191 tons, in the Waikato district of 4,015 tons, in the Reefton district of 1,423 tons, in the Malvern district of 4,082 tons, in the Miranda district of 3,077 tons, in the Mokau district of 1,900 tons, in the West Wanganui district of 1,102 tons; but there was a decline in the Greymouth district of 18,153 tons, in the Otago district of 748 tons, and in the Whangarei, Kamo, Ngunguru, and Whauwhau district of 2,320 tons.

The quantities of coal produced in each district are as under :—

Name of District.	Output of Coal.		Increase or Decrease.	Approximate Total Output of Coal up to the 31st December, 1903.
	1903.	1902.		
	Tons.	Tons.	Tons.	Tons.
Kawakawa and Hikurangi ..	71,684	60,606	11,078	1,322,108
Whangarei, Kamo, Ngunguru, and Whauwhau	29,835	32,155	– 2,320	529,609
Waikato	95,556	91,541	4,015	1,438,351
Mokau	6,150	4,250	1,900	39,934
Miranda	6,570	3,493	3,077	10,493
Pelorus	..	..	..	711
West Wanganui	1,102	..	1,102	56,285
Westport	571,306	528,462	42,844	5,281,318
Reefton	10,183	8,760	1,423	109,189
Greymouth	198,441	216,594	–18,153	3,498,323
Malvern	23,527	19,445	4,082	442,456
Timaru	..	..	..	10,657
Otago	307,562	308,310	– 748	4,978,531
Southland	98,277	89,086	9,191	845,438
Totals	1,420,193	1,362,702	57,491 Net.	18,563,403

(–) Decrease.

The following table, constructed from "Laboratory Reports of the Geological Survey" (Sir J. Hector) gives the composition of samples of New Zealand coals freshly taken from the principal mines :—

Number.	Description.	Locality.	Analysis.				Evaporative Power.*	
			Fixed Carbon.	Hydrocarbon.	Water.	Ash.	1.	2.
1	Anthracite ..	Acheron, Canterbury ..	84·12	1·96	1·80	12·12	10·93	18·50
2	Bituminous ..	Coalbrookdale ..	74·83	20·50	1·16	3·51	9·70	16·45
3	„ ..	„ ..	70·00	22·15	2·52	5·33	9·10	15·40
4	„ ..	Banbury	69·97	25·71	0·99	3·33	9·09	15·38
5	Altered brown coal	Malvern Hills ..	68·54	19·89	4·15	7·42	8·27	12·50
6	Bituminous ..	Tyneside	65·59	29·18	0·82	4·41	8·52	13·55
7	Glance coal ..	Rakaia Gorge ..	64·51	21·27	6·76	7·46	8·30	13·20
8	Bituminous ..	Wallsend	62·87	31·64	1·66	3·83	8·17	13·82
9	„ ..	Grey River	62·37	29·44	1·99	6·20	8·01	13·22
10	Pitch coal ..	Kawakawa	61·16	28·00	2·51	8·33	7·95	12·55
11	Bituminous ..	Preservation Inlet ..	60·88	28·60	4·33	6·19	7·91	12·80
12	Pitch coal ..	Blackball, Grey River	60·20	29·97	8·01	1·82	7·82	12·20
13	Bituminous ..	Mokihinui	59·75	32·14	3·97	4·14	7·76	11·80
14	„ ..	Coalpit Heath ..	58·81	38·98	1·02	1·19	7·64	12·96
15	„ ..	Mokihinui	57·92	34·94	3·96	3·18	7·50	12·75
16	„ ..	Brunner Mine ..	56·62	35·68	1·59	6·11	7·36	12·46
17	„ ..	„ ..	56·21	37·73	1·50	4·56	7·30	12·36
18	„ ..	Westport	56·01	37·17	2·60	4·22	7·28	12·30
19	„ ..	Mokihinui	55·59	38·86	3·16	2·39	7·20	12·22
20	„ ..	Brunner	54·16	35·85	2·50	7·49	7·04	11·91
21	Altered brown coal	Malvern Hills ..	53·29	32·04	12·65	2·02	6·92	11·50
22	Bituminous ..	Wallsend	53·10	35·47	1·41	10·02	6·90	11·68
23	„ ..	Otamataura Creek ..	52·89	36·63	2·19	8·29	6·90	11·70
24	„ ..	Near Cape Farewell ..	51·37	38·72	4·38	5·53	6·31	11·60
25	Pitch coal ..	Kawakawa	50·15	42·63	4·18	3·04	6·50	11·80
26	Glance coal ..	Whangarei	50·11	38·68	8·01	3·20	6·50	11·75
27	Pitch coal ..	Kamo	50·01	37·69	9·61	2·69	6·50	11·17
28	Brown coal ..	Malvern Hills ..	49·99	35·42	11·79	2·80	6·49	10·90
29	„ ..	Fernhill	49·95	36·95	12·00	1·10	6·49	10·99
30	„ ..	Allandale	47·31	34·26	12·41	6·02	6·15	10·96
31	„ ..	Kaitangata	46·48	33·48	14·66	5·38	6·04	10·22
32	„ ..	Shag Point	46·21	32·65	16·02	5·12	6·00	10·16
33	„ ..	Homebush	44·92	36·00	15·83	3·25	5·83	9·87
34	Pitch coal ..	Hikurangi, Whangarei	44·50	47·00	5·99	2·51	5·78	9·79
35	Brown coal ..	Hokonui	44·28	38·22	16·50	1·00	5·75	9·77
36	„ ..	Kaitangata	44·11	38·32	15·44	2·13	5·74	9·96
37	„ ..	Nightcaps	43·62	33·68	18·33	4·37	5·67	9·59
38	Pitch coal ..	Shag Point	43·19	30·05	15·82	10·94	5·61	9·52
39	Brown coal ..	Springfield	42·68	33·66	18·65	5·01	5·55	9·38
40	„ ..	Orepuki	42·64	36·26	14·44	6·66	5·54	9·38
41	„ ..	Kaitangata	38·29	32·43	17·50	11·78	4·87	8·32
42	„ ..	Shag Point	35·76	30·86	13·22	20·16	4·64	7·85
43	„ ..	Allandale	34·72	41·43	18·99	4·86	4·51	7·63
44	Pitch coal ..	Grey River	34·72	56·48	6·20	2·60	4·51	7·63
		For Comparison.						
	Newcastle, N.S.W.	Best	58·33	34·17	1·83	5·67	7·50	12·82
	„	Worst	53·34	26·66	3·33	16·67	6·90	11·72

*The second column headed "Evaporative Power" is obtained by the use of a multiple computed from the results of Professor Liversedge's experiments upon the coals of New South Wales. The multiple used for the first column is the one which has long been generally used for computing the evaporative power of coals; but, to prevent any unfair and prejudicial comparison of our coals with those of New South Wales, the second column is given.

As regards the quality of the coal, it cannot be surpassed. The late Sir John Coode, in his presidential address to the Institute of Civil Engineers, London, stated: "The bituminous coal found on the west coast of the Middle Island is declared by engineers to be fully equal, if not superior, to the best description from any part of the world."

The quantity of each class of coal produced in 1902 and 190 was:—

Class of Coal.	Output of Coal.		Increase or Decrease.	Approximate Total Output of Coal up to the 31st December, 1903.
	1902.	1903		
	Tons.	Tons.	Tons.	Tons.
Bituminous and semi-bituminous	845,046	879,891	+34,845	10,426,714
Pitch	25,245	21,116	− 4,129	1,859,072
Brown	427,172	441,814	+14,642	5,593,085
Lignite	65,239	77,372	+12,133	684,532
Totals	1,362,702	1,420,193	+57,491	18,563,403

It has been computed that to deliver coal at the pit-mouth costs in labour 6s. a ton. The number of persons employed in all the coal-mines last year was 2,852, and the output of coal 1,420,193 tons: the average earning for each person would thus be £149 7s. 9d. per annum, or about £2 17s. 5d. per week.

State Coal-mines.

The development-works at the State Coal-mines at Seddonville were completed during the year 1903. The coal is viewed with great favour by marine engineers. The output for the year has been small, but it is expected the mine will be capable of producing an output of 1,500 tons per week.

At the Point Elizabeth Mine near Greymouth the development-works are nearing completion, and it is estimated the mine will produce an output of 2,000 tons per week, but this will not be possible till the railway-line to Greymouth is completed.

Phosphate Rock.

Fairly extensive deposits of phosphate rock have been discovered as a fringe to the limestone at Clarendon, near Milton, Otago. The Ewing Phosphate Company (Limited) has been formed, and operations of quarrying and burning on a commercial scale have been undertaken. After burning, the rock is crushed and chemically treated. The value of this phosphate as a fertiliser has been satisfactorily proved, and there is every indication of a growing industry in quarrying the rock and preparing it for use. With such a valuable material at our very doors, there is no doubt that in future the

importation of phosphate manures will cease, or at least be greatly reduced, whilst the question of export from this colony is within the range of possibility.

Other Metals or Minerals.

Very little has been done in the colony to prospect and develop mines other than for gold and silver. The only exports last year of metalliferous products, excluding gold and silver, were 472 tons of auriferous ore, 21 tons of lead-ore, 42 tons of scheelite-ore, 2 tons of tin-ore, and small parcels of other minerals, representing an aggregate value of £7,014.

Kauri-gum.

The quantity of kauri-gum exported last year was 9,357 tons, as against 7,430 tons for 1902. Last year's produce (£631,102) gave an average value of about £67 8s. 11d. per ton, while for 1902 the average was £60 11s. 11d. per ton.

SECTION XII. — OCCUPATION OF LAND; AND LIVE-STOCK.

THE occupation of land must not be confused with ownership,* because there are large parcels of lands held which are unused and unoccupied. Neither can lands occupied be properly compared with the returns of Crown lands alienated or in process of alienation, for certain lands have passed into the hands of Europeans which were never made waste lands of the Crown.

The occupied lands of the colony for 1903–1904 have been returned by the Department of Agriculture at 36,476,481 acres, including Crown lands leased for pastoral purposes only, or 589,034 acres in excess of the area for the preceding year.

Tables are given showing the numbers and acreages of holdings, grouped according to size, for the last five years in which the Department of Agriculture has compiled the information.

In 1895 the holdings of over 1 acre in extent, as returned to the Registrar-General, numbered only 46,676. Holdings occupied by Maoris were excluded, besides holdings of exactly 1 acre, also gardens and orchards attached to residences.†

OCCUPIED LANDS: HOLDINGS.

[This and the succeeding statement deal with the full extent of occupied land, *including* Crown pastoral leases.]

Sizes of Holdings.	No. of Holdings.				
	1899–1900.	1900–1901.	1901–1902.	1902–1903.	1903–1904.
1 acre to 10 acres, inclusive	17,454	17,468	17,817	18,348	18,731
10 acres to 50 "	11,505	11,399	11,531	11,348	11,386
50 " 100 "	7,195	7,162	7,130	7,239	7,245
100 " 200 "	9,177	9,080	9,332	9,400	9,570
200 " 320 "	5,675	5,751	5,898	5,998	6,145
320 " 640 "	5,830	6,023	6,201	6,387	6,566
640 " 1,000 "	2,128	2,212	2,324	2,449	2,497
1,000 " 5,000 "	2,667	2,802	2,854	3,003	3,075
5,000 " 10,000 "	352	392	393	366	379
10,000 " 20,000 "	233	233	234	217	223
20,000 " 50,000 "	169	167	165	175	169
50,000 acres and over	100	97	103	104	106
	62,485	62,786	63,982	65,034	66,092

* The latest information in reference to ownership of land which is available gives figures up to the 31st March, 1902. It is contained in Parliamentary Return B.-20 of that year, and states the total number of owners of land (town and country holdings of all sizes) to be 115,713 for the colony. The most important figures (showing ownership of *productive* land) are those of freeholders outside boroughs and town districts, and excluding holdings of under 5 acres. These figures are:—

NEW ZEALAND OWNERS (OVER 5 ACRES).

Year 1902	43,735	Year 1886	34,450
" 1892	38,935	" 1883	30,764
" 1889	37,432		

† At the census of April, 1901, the actual number of persons described in the census schedules as having occupations necessitating their occupying holdings of land was 40,144. This number includes 28,337 farmers, 3,220 runholders, 895 market-gardeners, 2,388 horticulturists or gardeners, 4,702 dairy-farmers, 345 fruit-growers, 29 vignerons, 159 poultry-farmers, 35 bee-farmers, and 34 others.

The holdings are shown to have increased by the number of 3,607 since 1899–1900.

The total acreage of occupied land for each of the last five years is shown:—

OCCUPIED LANDS: ACREAGES.

Sizes of Holdings in Acres.	1899–1900. Acres.	1900–1901. Acres.	1901–1902. Acres.	1902–1903. Acres.	1903–1904. Acres.
1 to 10 inclusive ...	70,290	71,387	73,954	73,726	76,464
10 " 50 " ...	322,936	320,158	324,620	314,940	319,241
50 " 100 " ...	568,716	556,868	560,888	566,406	570,736
100 " 200 " ...	1,404,581	1,389,120	1,431,532	1,424,265	1,462,747
200 " 320 " ...	1,475,195	1,493,761	1,543,749	1,550,548	1,594,245
320 " 640 " ...	2,688,231	2,772,325	2,836,787	2,908,745	3,016,780
640 " 1,000 " ...	1,731,636	1,843,235	1,924,982	1,960,730	2,007,817
1,000 " 5,000 " ...	5,495,467	5,715,047	5,849,516	6,195,878	6,171,815
5,000 " 10,000 " ...	2,451,073	2,591,497	2,525,849	2,600,348	2,612,806
10,000 " 20,000 " ...	3,201,355	3,272,741	3,285,879	3,146,714	3,383,033
20,000 " 50,000 " ...	5,535,541	5,417,990	5,578,887	5,272,922	5,107,555
50,000 and over " ...	9,477,632	9,467,444	9,571,246	9,872,225	10,153,242
	34,422,653	34,911,573	35,507,889	35,887,447	36,476,481

In regard to holdings, out of a total of 66,092 in 1904 the large proportion of 37,362, or 56·53 per cent., were from 1 to 100 acres in extent; 46,932, or 71·01 per cent., were from 1 to 200 acres; and 53,077, or 80·31 per cent., were from 1 to 320 acres in size. The total number over 320 acres was only 13,015, or 19·69 per cent. of the whole, thus indicating a considerable degree of moderately close settlement, although the area of the holdings over the 320-acres limit necessarily shows as very large in a table which includes the Crown pastoral leases.

The plan of excluding these leases from the table showing the holdings in classes has its advantages, though not now adopted.

From the total extent of occupied land shown for the colony, such of the area of the Crown pastoral leases *as has been distinguished by the enumerators* can be deducted, and comparison then made for the census years 1886 and 1891, and the Agricultural Department returns for 1903–1904. The figures are:—

—	Census Results, March, 1886.	Census Results, April, 1891.	Figures returned by Department of Agriculture, 1903–1904.
	Acres.	Acres.	Acres.
Total area of occupied land (after deducting Crown pastoral leases)	17,077,074	19,951,925	27,471,941

The acreage shown in the returns as held on Crown pastoral lease would appear to have been understated in the returns rendered by occupiers, for the table (which is given hereunder) shows little more than nine millions of acres. The figures in the previous

column headed "Held from Crown under Various Tenures" seem greater than they should be, judging from the Lands Department returns. Possibly there may have been some misplacements, and caution is advised in using the numbers in the last two columns.

OCCUPATION OF LAND: TENURE.

Provincial Districts.	Total Area of Holdings.	Freehold.	Leased from Private Individuals or Public Bodies.	Leased from Natives.	Held from Crown under Different Tenures.	Held under Pastoral Lease
	Acres.	Acres.	Acres.	Acres.	Acres.	Acres.
Auckland ..	5,958,017	3,886,145	552,653	482,636	964,757	71,826
Taranaki ..	1,096,606	569,680	224,738	100,811	200,327	1,050
Hawke's Bay ..	3,365,022	1,660,184	422,592	901,851	312,712	67,690
Wellington ..	3,824,105	2,446,156	488,367	247,568	621,382	20,632
Marlborough ..	2,434,661	816,575	58,174	27,410	1,038,867	493,635
Nelson ..	2,042,914	968,930	95,772	19,950	300,410	657,852
Westland ..	564,539	58,222	15,328	7,293	262,712	220,984
Canterbury ..	6,663,136	2,687,811	865,583	10,068	505,679	2,593,995
Otago ..	10,527,474	2,895,952	919,269	19,153	1,816,224	4,876,876
Totals ..	36,476,481	15,989,655	3,642,476	1,816,740	6,023,070 *	9,004,540 *

* For remarks as to the accuracy of the figures in these columns see above.

It would appear that holders of their lands from the Crown do not return to collectors so much as the quantity on which they pay rent to Government. The acreages stated to be held under Crown pastoral lease do not agree with the tables of the Lands Department.

Arranged according to the number of holdings, the provincial districts stand in order as under:—

Auckland	16,710 holdings.
Otago	13,765 "
Canterbury	11,293 "
Wellington	11,012 "
Taranaki	4,726 "
Hawke's Bay	3,227 "
Nelson	3,204 "
Marlborough	1,476 "
Westland	679 "

The occupied holdings of the North Island now considerably outnumber those of the Middle Island, the numbers being—North Island, 35,675; Middle Island, 30,417. For the year 1896–97 the returns showed 29,535 holdings for the Middle Island, against 29,369 for the North, besides 36 holdings at the Chatham Islands of which no account has been taken recently.

The full details of holdings and acreages, classified according to size, for the year 1903–1904 will be found in the table on the following page:—

Occupation of Land: Number and Area of Holdings (including Crown Pastoral Leases).

As compiled by the Department of Agriculture.

Table showing for the Year 1903–1904 the Occupied Holdings and the Acreages (including Crown Pastoral Leases) in Groups of Sizes, according to the Provincial Districts.

Provincial District.	Total of Holdings.	1–10 Acres, inclusive.	Over 10–50 Acres, inclusive.	Over 50–100 Acres, inclusive.	Over 100–200 Acres, inclusive.	Over 200–320 Acres, inclusive.	Over 320–640 Acres, inclusive.	Over 640–1,000 Acres, inclusive.	Over 1,000–5,000 Acres, inclusive.	Over 5,000–10,000 Acres, inclusive.	Over 10,000–20,000 Acres, inclusive.	Over 20,000–50,000 Acres, inclusive.	Over 50,000 Acres.
Auckland: Area in acres ...	5,958,017	18,457	86,352	165,157	372,157	398,334	713,422	487,557	1,342,900	647,471	440,097	654,549	631,564
Number of holdings ...	*16,710*	*4,738*	*2,947*	*2,067*	*2,454*	*1,532*	*1,564*	*598*	*665*	*89*	*30*	*19*	*7*
Taranaki: Area in acres ...	1,096,606	3,440	17,304	59,813	177,856	177,678	218,376	120,022	286,071	...	36,046	...	...
Number of holdings ...	*4,726*	*704*	*592*	*759*	*1,192*	*688*	*478*	*151*	*159*	...	*3*	...	...
Hawke's Bay: Area in acres ...	3,365,029	4,849	16,555	21,640	40,057	48,234	127,470	101,307	511,382	322,453	652,641	872,669	645,772
Number of holdings ...	*3,227*	*1,100*	*624*	*277*	*270*	*186*	*262*	*148*	*228*	*50*	*43*	*32*	*7*
Wellington: Area in acres ...	3,824,105	13,318	48,517	94,203	292,814	255,257	529,755	355,661	1,054,325	361,812	461,070	228,642	128,731
Number of holdings ...	*11,012*	*3,045*	*1,751*	*1,170*	*1,849*	*990*	*1,151*	*427*	*534*	*53*	*33*	*7*	*2*
Marlborough: Area in acres ...	2,434,661	1,721	5,121	8,982	21,304	27,983	83,839	70,681	273,295	139,689	233,679	395,388	1,172,979
Number of holdings ...	*1,476*	*469*	*186*	*118*	*144*	*105*	*174*	*89*	*130*	*20*	*15*	*14*	*12*
Nelson: Area in acres	2,042,914	3,157	18,774	31,367	66,372	75,223	134,773	111,119	256,832	74,910	231,004	266,066	773,317
Number of holdings ...	*3,204*	*799*	*645*	*398*	*454*	*290*	*297*	*149*	*136*	*11*	*7*	*12*	*6*
Westland: Area in acres ...	564,539	593	3,637	6,026	16,555	18,009	26,212	8,964	50,553	105,408	140,295	188,287	...
Number of holdings ...	*679*	*180*	*118*	*81*	*107*	*68*	*59*	*12*	*23*	*15*	*10*	*6*	...
Canterbury: Area in acres ...	6,663,136	15,378	59,833	84,799	187,614	214,908	448,293	292,233	1,117,604	439,836	396,761	797,291	2,608,586
Number of holdings ...	*11,293*	*3,842*	*2,176*	*1,112*	*1,248*	*846*	*983*	*362*	*576*	*65*	*27*	*27*	*29*
Otago: Area in acres	10,527,474	15,551	63,148	98,749	288,018	378,619	734,640	460,273	1,278,853	521,227	791,440	1,704,663	4,192,293
Number of holdings ...	*13,765*	*3,854*	*2,347*	*1,263*	*1,852*	*1,440*	*1,598*	*561*	*624*	*76*	*55*	*52*	*43*
Totals { Area in acres ...	36,476,481	76,464	319,241	570,736	1,462,747	1,594,245	3,016,780	2,007,817	6,171,815	2,612,806	3,383,033	5,107,555	10,153,242
Number of holdings	*66,992*	*18,73.*	*11,386*	*7,245*	*9,570*	*6,145*	*6,566*	*2,497*	*3,075*	*379*	*223*	*169*	*106*

Live-stock.

A comparative table is presented showing the increase in live-stock since the year 1858. The figures are taken from the census as far as 1891, but for 1895–96 and following years the results of the enumeration made annually by the Department of Agriculture under "The Agricultural and Pastoral Statistics Act, 1895," have been made use of.

Year.	Horses.	Asses and Mules.	Cattle.	Sheep.	Goats.	Pigs.	Poultry.
1858 ..	14,912	122	137,204	1,523,324	11,797	40,734	*
1861 ..	28,275	153	193,285	2,761,383	12,191	43,270	236,098
1864 ..	49,409	339	249,760	4,937,273	12,005	61,276	378,414
1867 ..	65,715	323	312,835	8,418,579	11,964	115,104	676,065
1871 ..	81,028	397	436,592	9,700,629	12,434	151,460	872,174
1874 ..	99,859	267	494,917	11,704,853	14,276	123,921	1,058,198
1878 ..	137,768	241	578,430	13,069,338	14,243	207,337	1,323,542
1881 ..	161,736	362	698,637	12,985,085	11,223	200,083	1,566,114
1886 ..	187,382	297	853,358	16,564,595	10,220	277,901	1,679,021
1891 ..	211,040	348	831,831	18,128,186	9,055	308,812	1,790,070
1895–96	237,418	426	1,047,901	19,826,604†	*	239,778	*
1896–97	249,813	434	1,138,067	19,138,493†	*	209,834	*
1897–98	252,834	393	1,209,165	19,687,954†	*	186,027	*
1898–99	258,115	534	1,203,024	19,673,725†	*	193,512	*
1899–1900	261,931	459	1,222,139	19,348,506†	*	249,751	*
1900–1901	266,245	480	1,256,680	19,355,195†	*	250,975	*
1901–1902	279,672	406	1,361,784	20,233,099†	*	224,024	*
1902–1903	286,955	464	1,460,663	20,342,727†	*	193,740	*
1903–1904	298,714	468	1,593,547	18,954,553†	*	226,591	*

* Not enumerated. † Numbers for April, 1895, and years following.

The stock owned by Maoris in the year 1901, which is included above, comprised 317,436 sheep and 36,943 head of cattle. The number of horses is not specified, but is known to be large.

Table showing for each County in New Zealand the Number of Horses, Cattle, Sheep, and Pigs in 1903.

County.	Horses, October, 1903.	Cattle, including Calves, October, 1903.	Dairy Cows, included in foregoing.	Sheep, including Lambs, April, 1903.	Pigs, October, 1903.
Mongonui ..	2,293	9,931	1,764	23,358	3,247
Whangaroa ..	611	1,854	124	8,243	1,441
Bay of Islands ..	2,737	11,535	2,091	32,037	2,322
Hokianga ..	2,679	7,075	2,156	11,522	2,581
Rodney	2,357	16,379	4,285	68,866	834
Whangarei ..	4,631	32,321	8,596	32,417	1,706
Otamatea ..	1,879	16,707	3,491	46,364	1,040
Hobson	2,168	15,927	3,292	19,914	1,914
Waitemata ..	2,581	13,376	4,074	33,849	1,623
Eden	5,546	6,854	3,535	4,809	2,133
Manukau ..	8,999	55,758	20,429	89,569	7,094

TABLE SHOWING THE NUMBER OF HORSES, CATTLE, SHEEP, ETC.—*continued.*

County.	Horses, October, 1903.	Cattle, including Calves, October, 1903.	Dairy Cows, included in foregoing.	Sheep, including Lambs, April, 1903.	Pigs, October, 1903.
Coromandel ..	1,125	4,753	1,021	15,317	1,087
Thames ..	1,552	5,319	2,004	5,340	1,115
Ohinemuri ..	1,787	6,804	2,449	3,559	1,950
Waikato ..	3,638	26,791	8,180	44,612	3,747
Raglan	3,164	27,313	4,147	87,666	2,223
Waipa	3,767	25,528	8,587	20,477	3,414
Piako	3,123	32,026	5,179	152,942	1,959
West Taupo and Kawhia	4,930	23,493	2,587	36,167	6,231
East Taupo and Rotorua	1,361	2,917	330	29,305	1,617
Tauranga ..	2,807	16,749	3,055	2,061	2,101
Whakatane ..	1,056	5,465	1,650	20,943	551
Opotiki	1,633	8,125	1,820	16,038	1,253
Waiapu	4,141	16,787	508	373,079	5,131
Cook	7,446	52,635	5,024	908,335	3,772
Wairoa	3,199	12,435	1,809	536,913	1,354
Hawke's Bay ..	8,283	34,656	4,744	1,208,213	4,106
Waipawa ..	4,737	34,395	7,132	654,013	1,921
Woodville ..	2,687	15,010	1,259		1,531
Patangata and Weber	1,282	35,094	5,238	717,534	699
Clifton	1,504	20,523	5,444	30,672	1,512
Taranaki ..	4,935	50,981	22,248	27,234	6,329
Egmont ..	2,161	32,451	14,132		2,395
Stratford ..	2,892	46,775	20,232	79,836	3,748
Hawera ..	5,413	75,551	33,556	105,847	10,229
Patea	3,302	32,848	9,122	193,262	2,373
Waitotara ..	2,136	16,926	3,865	129,813	1,601
Wanganui ..	3,832	18,407	4,259	351,673	2,581
Waimarino ..	1,193	3,822	1,106		2,447
Rangitikei ..	6,195	40,367	9,971	539,492	4,165
Kiwitea	2,341	22,054	6,841	247,441	2,624
Pohangina ..	1,155	11,796	4,406	104,578	1,951
Oroua	2,559	19,506	8,744	255,860	3,564
Kairanga ..	3,537	21,997	9,478		3,707
Manawatu ..	2,746	23,641	8,113	122,864	3,765
Horowhenua ..	3,735	27,660	8,712	124,543	4,787
Hutt	5,299	15,671	7,889	196,203	3,136
Featherston ..	3,185	26,015	4,091	416,169	2,108
Wairarapa South ..	2,439	22,966	5,393	161,960	2,362
Masterton ..	3,862	26,790	3,310	514,552	1,546
Castlepoint ..	524	7,886	276	145,764	60
Akitio	1,215	14,707	2,651	152,800	530
Pahiatua ..	2,223	23,966	9,599	202,820	3,502
Eketahuna ..	1,041	9,286	4,529	62,857	1,783
Mauriceville ..	460	4,387	1,946	64,129	560
Marlborough ..	3,717	5,513	1,964	491,006	1,417
Sounds	903	6,060	1,957	161,057	1,601
Kaikoura ..	1,248	3,143	922	174,411	440
Collingwood ..	1,366	7,743	2,733	45,361	2,542
Waimea ..	4,898	14,153	5,802	214,804	4,340
Buller	551	3,355	1,386	2,276	456

TABLE SHOWING THE NUMBER OF HORSES, CATTLE, SHEEP, ETC.—*continued.*

County.	Horses, October, 1903.	Cattle, including Calves, October, 1903.	Dairy Cows, included in foregoing.	Sheep including Lambs, April, 1903.	Pigs, October, 1903.
Inangahua ..	988	6,529	1,372	25,912	816
Amuri	1,448	4,295	340	382,149	143
Cheviot	893	1,299	595	186,640	442
Westland ..	1,423	6,197	2,068	11,227	673
Grey	925	10,581	1,362	16,878	528
Ashley	8,765	20,243	7,700	750,441	6,814
Selwyn	15,692	34,090	16,461	697,569	17,807
Akaroa and Mount Herbert	2,754	25,536	6,013	230,894	2,592
Ashburton ..	10,226	11,198	3,792	888,842	7,438
Geraldine ..	4,478	7,209	2,408	642,566	3,383
Levels	3,683	6,762	2,605		1,969
Waimate ..	5,986	12,543	4,025	573,551	3,104
Mackenzie ..	1,636	3,175	1,070	392,373	406
Waitaki.. ..	5,827	25,099	10,371	543,058	3,736
Waihemo ..	1,464	4,831	2,030	112,270	539
Waikouaiti ..	1,533	9,755	5,320	71,238	1,536
Peninsula ..	883	7,276	4,103	1,948	782
Taieri	7,119	25,602	9,308	188,782	3,998
Bruce	3,764	9,970	3,510	160,564	1,420
Clutha	4,959	18,486	5,703	282,320	1,860
Tuapeka ..	3,978	6,679	2,274	351,955	905
Maniototo ..	2,335	6,458	1,552	301,496	482
Vincent.. ..	2,354	5,099	1,389	291,788	755
Lake	1,501	4,218	766	153,576	552
Southland ..	17,891	67,574	20,626	771,348	6,633
Wallace and Fiord	5,432	21,558	6,014	400,800	1,394
Stewart Island ..	11	327	111	1,622	26
Totals ..	298,714	1,593,547	468,125*	18,954,553	226,591

* Not including 47,054 heifers over two years old intended for dairying.

Live-stock in Australasia.

The following gives the number of the principal kinds of live-stock in Australasia for the year 1902–1903 :—

State or Colony.	Sheep.	Cattle.	Horses.	Pigs
Queensland	7,213,985	2,543,471	399,122	77,202
New South Wales	26,649,424	1,741,226	450,125	192,097
Victoria	10,841,790	1,602,384	392,237	350,370
South Australia	4,922,662	519,163	179,413	83,791
Western Australia	2,697,897	437,588	80,114	52,765
Tasmania..	1,679,518	168,385	33,465	52,092
	April, 1902.	Oct., 1902.	Oct., 1902.	Oct., 1902.
New Zealand	20,342,727	1,460,663	286,955	193,740

New Zealand thus takes second place in order for number of sheep, and fourth for the number of her cattle and horses.

The losses in Australia have raised this colony to the second position in regard to sheep. To illustrate this, the case of Queensland shows 19,856,959 sheep in 1895, falling to 10,030,971 in 1901, and further to 7,213,985 in 1902; cattle fell in number from 7,012,997 in 1894 to 3,772,707 in 1901, and again to 2,543,471 in 1902.

Sheep.

The returns made to the Department of Agriculture show a smaller number of sheep for the years 1886 and 1891 than the census figures given previously, because the account was taken later in the year. The particulars are given for eighteen years, distinguishing the number for the North from that in the Middle Island.

According to these returns, the flocks of the North Island increased from 5,285,907 sheep in the year 1886 to 9,433,831 in 1903, or at the rate of over 78 per cent., while sheep in the Middle Island decreased from 9,888,356 to 9,520,722, a loss of 3·72 per cent. in the same period. For the North Island the increase during the eighteen years was 4,147,924 sheep, while in the Middle Island there was a decrease of 367,634.

Year.	North Island.	Middle Island.	Total.
1886	5,285,907	9,888,356	15,174,263
1887	5,506,485	9,649,141	15,155,626
1888	5,668,996	9,373,202	15,042,198
1889	5,990,244	9,433,084	15,423,328
1890	6,588,346	9,527,767	16,116,113
1891	7,159,927	9,593,825	16,753,752
1892	8,204,029	10,366,723	18,570,752
1893	8,685,361	10,695,008	19,380,369
1894	9,169,352	11,061,477	20,230,829
1895	8,994,646	10,831,958	19,826,604
1896	9,131,736	10,006,757	19,138,493
1897	9,540,717	10,147,237	19,687,954
1898	9,864,945	9,808,780	19,673,725
1899	9,953,399	9,395,107	19,348,506
1900	9,998,173	9,357,022	19,355,195
1901	10,218,945	10,014,154	20,233,099
1902	10,286,346	10,056,381	20,342,727
1903	9,433,831	9,520,722	18,954,553

There was a decrease of 1,388,174 in the total number of sheep since April, 1902, by the above figures, and a decrease between 1893 and 1903 amounting to 425,816, or at a rate of 2·20 per cent. The export and local consumption of wool developed from 111,537,546 lb. for the year ended September, 1891, to 166,214,345 lb. for the corresponding year of 1903. The export of sheepskins and pelts, which in 1890 was 2,292,521 in number, rose to 7,142,531 in 1903.

In spite of the great slaughter required for the export of frozen mutton, the number of sheep in New Zealand kept up wonderfully until the last year for which results are shown on the previous page.

The proportion of small flocks of sheep has increased very considerably, and with smaller flocks the rabbit difficulty should be easier to master than with large ones.

NUMBER OF FLOCKS, 1886, 1891, 1896, 1901, 1902, AND 1903.

Size of Flocks.	1886.	1891.	1896.	1901.	1902.	1903.
Under 500	6,024	8,272	12,028	11,700	11,961	12,428
500 and under 1,000	1,189	1,691	2,605	3,059	3,158	2,923
1,000 „ 2,000	747	969	1,460	2,877*	2,962*	2,751*
2,000 „ 5,000	532	666	892			
5,000 „ 10,000	263	287	340	397	385	342
10,000 „ 20,000	228	239	231	189	206	207
20,000 and upwards ..	166	169	147	138	131	110
	9,149	12,293	17,703	18,360	18,803	18,761

	1901.	1902.	1903.
* From 1,000 to 2,500	2,189	2,232	2,081
„ 2,500 to 5,000	688	730	670
	2,877	2,962	2,751

The average size of the flocks is found to have been 1,659 sheep for 1886, 1,081 in 1896, and 1,010 in 1903.

Of the provincial districts, that of Canterbury had most sheep in 1903, Wellington came next, and Otago occupied the third place. The full particulars, showing decreases since 1902 to be general throughout the colony, are given :—

Provincial District.	No. of Sheep in 1903.	No. of Sheep in 1902.	Decrease.
Canterbury	4,176,236	4,341,542	165,306
Wellington	3,793,518	4,222,510	428,992
Otago	3,632,765	3,965,342	332,577
Hawke's Bay	3,116,673	3,292,659	175,986
Auckland	2,086,789	2,218,344	131,555
Nelson	857,142	872,092	14,950
Marlborough	826,474	849,168	22,694
Taranaki	436,851	552,833	115,982
Westland	28,105	28,237	132
	18,954,553	20,342,727	1,388,174

The number of breeding ewes in the colony in April, 1902, was returned at 9,610,149, and in April, 1903, at 9,071,751, thus showing a substantial decrease of 538,398 for the year—a matter for serious consideration. In April, 1901, the number was returned at 9,906,616. The annual export and consumption of sheep during the last five years has been :—

Year.	Export of Frozen Mutton and Lamb, including Pieces at 60 lb. to a Sheep.	Live Sheep exported.	Estimated Consumption in the Colony: Carcases.	Total.
1899	3,468,431	4,362	1,780,000	5,252,793
1900	3,055,135	3,840	1,800,000	4,858,975
1901	3,400,138	3,668	1,834,000	5,237,806
1902	4,084,578	48,047	1,904,000	6,036,625
1903	4,922,622	21,763	1,942,000	6,886,385

It has been estimated that the annual consumption of mutton in New Zealand is equivalent to 2·25 sheep per inhabitant, and that the number of sheep required in the present year (1904) for food will be about 1,998,000 (Maoris, for the purposes of this calculation, have been included.)

Two important advantages that sheep-farming has in New Zealand are (1) the low cost of the production of mutton, and (2) the high percentage of natural increase. With regard to the high percentage of increase, there need only be cited a few average returns from well-known flocks to show what excellent lambings New Zealand farmers obtain under good management.

LAMBING RETURNS.—AVERAGES.

Locality.	Breed of Flock.	Breed of Rams.	Breed of Ewes.	No. of Ewes.	Percentage of Lambs.	Remarks.
North Island ..	Lincoln	Lincoln	Lincoln	7,517	81·04	Land merely surface-sown in English grass pasture.
„ ..	„	„	„	5,301	85·05	
„ ..	„	„	⅞ Lincoln	12,177	100·00	
„ ..	Romney	Romney	Romney	1,141	96·17	
„ ..	Lincoln	Southd'n	Lincoln	2,033	94·71	
Middle Island	Merino	Merino	Merino	14,765	75·36	Mountainous country in n'tive past're, unimproved.
„ ..	„	B. Leic'str	„	4,235	88·94	
„ ..	Cross-bred	„	Cross-bred	8,624	80·82	In English grass pasture.
„ ..	Half-bred	„	Half-bred	2,747	82·79	
„ ..	B. Leic'str	„	B. Leic'str	778	90·77	
„ ..	Lincoln	Lincoln	Lincoln	452	88·08	
„ ..	R. Marsh	R. Marsh	R. Marsh	253	111·46	
„ ..	E. Leic'str	E. Leic'str	E. Leic'str	464	93·34	
„ ..	Shropshire	Shropshire	Shropshire	168	97·41	
„ ..	Southd'n	Southd'n	Southd'n	114	96·87	

The above returns are fair average ones, but much higher might have been shown if exceptional cases had been selected.

Cattle.

The cattle as enumerated in 1903–1904 for each provincial district are given in the next table. Here is shown the substantial

increase of 132,884 head of all classes over the number returned in 1902–1903, and of no less than 43,016 in the number of cows and heifers for dairy purposes.

Provincial District.	Bulls for Stud Purposes.	Steers over Two Years Old.	Cows and Heifers for Dairy Purposes.	Cows and Heifers for Breeding Purposes.	Cows and Heifers for Fattening.	Steers and Heifers under Two Years not otherwise enumerated.	Totals.
Auckland	7,307	77,637	114,928	63,448	13,876	165,226	442,422
Taranaki	4,672	34,524	114,370	6,521	7,307	91,735	259,129
Hawke's Bay ..	2,027	23,501	22,636	36,388	3,622	43,416	131,590
Wellington ..	6,077	58,108	114,006	47,715	9,430	122,514	357,850
Marlborough ..	259	1,503	5,094	679	511	6,670	14,716
Nelson	681	4,962	13,419	1,960	1,856	14,496	37,374
Westland	248	3,726	4,042	2,598	1,136	5,028	16,778
Canterbury ..	1,746	14,546	46,870	2,613	4,688	50,293	120,756
Otago	3,612	26,542	79,814	14,673	7,523	80,768	212,932
Totals, 1903–1904..	26,629	245,049	515,179*	176,595	49,949	580,146	1,593,547
„ 1902–1903..	24,049	210,659	472,163*	170,641	47,161	535,990	1,460,663
Increase ..	2,580	34,390	43,016	5,954	2,788	44,156	132,884

*Including heifers over two years old intended for dairying: 43,390 in 1902–1903, and 47,054 in 1903–1904. For actual number of dairy cows in each county see table on pages 340 to 342.

Classified according to breed, the numbers for the two years under review are:—

	1902–1903.	1903–1904.
Pure-bred—		
Shorthorn	73,030	76,435
Hereford	11,315	11,799
Polled Angus	12,359	11,146
Ayrshire	4,987	4,547
Jersey	4,193	4,481
Other pure-breds	4,341	5,431
Crosses	1,350,438	1,479,708
Totals	1,460,663	1,593,547

Out of a total of 1,593,547 cattle in the colony, the North Island is shown to have had 1,190,991, or 75 per cent., while the Middle Island had 402,556, or 25 per cent. Similarly, the dairy cows and heifers intended for dairying in the North Island numbered 365,940, or 71 per cent., and in the Middle Island 149,239, or 29 per cent.

Thus, the North Island, which has an almost equal number of sheep to that of the Middle Island, contains nearly three times as many dairy cows and other cattle.

Of the total number of cattle (1,593,547) given above, 468,125 were dairy cows. It is found impossible to give a statement of the total quantity of butter and cheese made in the colony. All that can be said is that there were in September, 1903, 272 cheese and butter factories, with 380 skimming-stations, reported to the Department of Agriculture. A summary of the returns rendered by these factories to the Department of their output for the previous year makes it possible to arrive at the approximate quantity of cheese and butter made.

The number of butter and cheese factories in each provincial district as in September, 1903, with the output for the previous year, is next shown :—

Provincial District.	Number of Factories.			Skimming-stations.	Output.	
	Butter.	Cheese.	Butter and Cheese.		Butter.	Cheese.
					Tons.	Tons
Auckland ..	47	6	1	89	2,916¼	260½
Taranaki ..	76	6	9	71	6,252¾	1,079
Hawke's Bay ..	11	1	1	11	586¾	..
Wellington ..	31	15	2	106	4,659	1,445½
Marlborough ..	1	3	..	1	18	215
Nelson	9	1	..	5	188	10
Westland ..	2	..	..	3	52	..
Canterbury ..	7	7	1	32	1,236½	274½
Otago	8	24	3	62	2,126	1,753½
Totals, 1903 ..	192	63	17	380	18,035¼	5,038
„ 1902 ..	179	65	10	276	14,716½	5,600½

Of the above, 19 were returned as "new" in 1903, and in 12 cases the output was not stated. Three factories combined butter-making with milk-preserving, the output of the latter being 34 tons last year.

Horses.

The increase in horses is shown for four census years :—

Census Years.	Number of Horses.	Numerical Increase.	Increase per Cent.
1886	187,382	23,658	12·63
1891	211,040	26,378	12·50
1896	237,418	28,827	12·14
1901	266,245		

At the enumeration made in 1903–1904 (October to January), the number of horses was found to have increased to 299,182 (including 468 mules and asses), for which particulars are given. It will be seen that the Provincial District of Auckland had by far the most horses, Otago and Canterbury following, Wellington taking fourth place.

Provincial District.	Entires.	Geldings.	Mares over Two Years old.	Mares with Foal at Foot, or to foal this Season.	Colts and Fillies under Two Years old.	Totals.
Auckland ..	999	33,876	23,113	8,882	11,429	78,299
Taranaki ..	136	8,475	6,879	2,130	2,590	20,210
Hawke's Bay ..	162	8,780	6,411	2,290	2,568	20,211
Wellington ..	461	21,644	15,504	5,501	6,597	49,707
Marlborough ..	54	2,520	1,900	550	845	5,869
Nelson	92	4,174	3,529	970	1,384	10,149
Westland ..	38	1,121	684	210	296	2,349
Canterbury ..	447	22,672	17,736	5,375	7,076	53,306
Otago	429	24,814	19,484	5,735	8,620	59,082
Totals, 1903–1904	2,818	128,076	95,240	31,643	41,405	299,182*
„ 1902–1903	2,784	124,514	93,405	29,781	36,935	287,419*
Increase ..	34	3,562	1,835	1,862	4,470	11,763

* Including 468 mules and asses in 1904, and 464 in 1903.

Classified according to breed, the numbers for the two years under review are :—

	1902–1903.	1903–1904.
Thoroughbred	6,661	6,937
Hunter and hackney	23,483	22,836
Carriage and trotting	19,897	20,167
Light ordinary	120,284	126,148
Draught	104,146	110,136
Ponies under 14 hands	12,484	12,490
Mules and asses	464	468
Totals	287,419	299,182

The export of horses from New Zealand is not so large as might be expected. The figures for 1903 are: To Bengal, 150; Victoria, 65; Fiji, 42; New South Wales, 39; Natal, 11; Tasmania, 9; United Kingdom, 8; Norfolk Island and Cape Colony, 2 each; a total of 328.

Pigs.

The figures given in the accompanying table are those compiled by the Agricultural Department, and for 1903–1904 show an increase of 32,851 in the total number of pigs for the previous year, of which number 24,582 was the increase in the number of barrows and sows under one year old. The Auckland Provincial District has far more pigs than any other.

NUMBER OF PIGS IN EACH PROVINCIAL DISTRICT.

Provincial District.	Boars for Stud Purposes.	Barrows and Sows over One Year old, for Fattening.	Sows kept solely for Breeding Purposes.	Barrows and Sows under One Year old.	Totals.
Auckland ..	1,640	9,563	9,358	41,525	62,086
Taranaki ..	610	1,437	3,946	20,593	26,586
Hawke's Bay ..	245	964	1,370	7,032	9,611
Wellington ..	1,136	2,811	6,951	35,881	46,779
Marlborough ..	95	264	499	2,600	3,458
Nelson	198	952	1,151	6,438	8,739
Westland ..	34	260	192	715	1,201
Canterbury ..	800	2,359	5,989	34,365	43,513
Otago	656	2,325	3,340	18,297	24,618
Totals, 1903–1904	5,414	20,935	32,796	167,446	226,591
„ 1902–1903	4,716	18,950	27,210	142,864	193,740
Increase ..	698	1,985	5,586	24,582	32,851

The approximate numbers of the different breeds were :—

	1902–1903.	1903–1904.
Pure Berkshire	30,192	30,641
Pure Yorkshire	2,798	3,707
Other pure-breds	1,182	1,628
Crosses	159,568	190,615
Totals	193,740	226,591

Produce of New Zealand.

Estimated Value of the Produce of New Zealand (exclusive of Building Trades output) for the Year 1902–1903.

	£
1. Agricultural, pastoral, and dairy produce	18,600,000
2. Mining output	3,200,000
3. Fisheries and forests	1,200,000
4. Manufactures (other than those included above, being the great primary industries*)	4,700,000
Total (excluding value of building trades output†)	27,700,000

* The produce of great primary industries, such as meat-freezing establishments, butter factories, sawmills, &c., have been included in items 1 and 3.

† To add the value of building trades output would increase the total sum to over thirty millions sterling.

SECTION XIII.—AGRICULTURE.

By the Agricultural and Pastoral Statistics Act, passed in 1895, the duty of collecting returns devolved upon the Department of Agriculture. The plan adopted is similar to that used in the United Kingdom, the account of land laid down in crop being made up at an early date, while estimates of produce are made after the results of threshing are known.

A summary of the particulars obtained at the collection made in October, 1903, is now shown, with the finally corrected statements of yield of the principal crops. Full remarks on the progress of agriculture in New Zealand, in respect of all its features in detail, are supplied in the special article devoted to the subject which appears as the first of Section II., in Part III.

Acreage and Actual Yield in Principal Corn-crops, 1904.

Provincial District.	Wheat.			Oats.			Barley.			Maize.			Rye.		
	Acres.	Yield per Acre, in Bushels.	Total Bushels.	Acres.	Yield per Acre, in Bushels.	Total Bushels.	Acres.	Yield per Acre, in Bushels.	Total Bushels.	Acres.	Yield per Acre, in Bushels.	Total Bushels.	Acres.	Yield per Acre, in Bushels.	Total Bushels.
Auckland	3,186	27·12	86,407	1,015	33·20	33,700	1,337	28·24	37,757	10,196	47·27	481,973			
Taranaki	1,592	30·43	48,444	1,168	24·00	28,032	990	28·00	27,720	136	40·00	5,440			
Hawke's Bay ...	960	32·00	30,720	4,752	35·00	166,320	1,994	31·00	61,814	616	58·00	35,728			
Wellington ...	6,772	32·36	219,154	16,491	30·82	508,384	1,483	31·49	46,711	188	35·00	6,580			
Marlborough ...	4,865	24·00	116,760	2,462	34·00	83,708	7,855	28·00	219,940	...	...	...	1,176	17·00	19,992
Nelson	1,877	33·33	62,569	5,822	35·09	204,318	3,710	35·28	130,875	19	30·00	570			
Westland	...	...	...	35	30·00	1,050	...	...	...	...	...	...			
Canterbury ...	158,792	34·23	5,435,889	162,088	38·69	6,270,650	12,343	38·38	473,766	1*	...	...			
Otago	52,302	36·17	1,891,711	197,807	39·49	7,811,075	4,969	32·58	161,921	...	...	...			
Totals	230,346	34·26	7,891,654	391,640†	38·57	15,107,237	34,681	33·46	1,160,504	11,156	47·53	530,291	1,176	17·00	19,992

* Not included in averages. † Excluding 17,750 acres damaged by rust.

NUMBER OF ACRES UNDER CULTIVATION IN EACH PROVINCIAL DISTRICT, 1904.

Provincial District.	In Grass or Clover, sown after Land ploughed	In Grass, surface-sown: Land not ploughed.	In Hay, included in either or both of the Previous Columns.	In Bare Fallow.	In Grain-crops.	In Green and other Crops.	In Garden.	In Orchard or Vineyard.	Total in Grass, Crop, and Fallow.	In Plantations of Forest Trees.	Tussock or Native Grass, and Unimproved.
Auckland ..	618,513	1,597,538	12,596	10,119	22,166	98,631	3,759	11,957	2,362,683	9,145	3,586,189
Taranaki ..	168,219	657,930	11,224	471	7,342	18,556	953	848	854,319	1,047	241,240
Hawke's Bay ..	395,087	1,410,978	9,709	267	12,513	30,722	1,159	1,560	1,852,286	4,683	1,508,060
Wellington ..	271,699	2,325,432	14,917	1,101	33,319	61,353	2,295	3,747	2,698,946	4,427	1,120,732
Marlborough ..	93,488	266,760	2,410	305	17,503	18,435	258	516	397,265	1,280	2,036,116
Nelson ..	115,403	301,050	3,818	541	12,311	30,607	443	3,194	463,549	1,618	1,577,747
Westland ..	9,910	50,264	1,419	40	36	943	64	138	61,395	7	503,137
Canterbury ..	1,468,543	378,510	13,701	14,362	343,526	253,694	4,848	3,151	2,466,634	22,011	4,174,491
Otago ..	1,466,303	353,544	7,373	33,863	256,727	275,380	3,732	2,430	2,391,979	5,885	8,129,610
Totals ..	4,607,165	7,342,006	77,167	61,069	*705,443	788,321	17,511	27,541	13,549,056	50,103	22,877,322

* Including 17,750 acres of oats damaged by rust and not harvested.

ACREAGE UNDER SOWN GRASSES, AND CULTIVATION GENERALLY, FOR EAC COUNTY, AS ON THE 15TH OCTOBER, 1903.

Counties.	In Sown Grasses, after having been ploughed.	In Sown Grasses, not previously ploughed.	Land broken up but not under Crop.	Total under Crop.	In Garden.	In Orchard.	Plantations of Forest Trees.
	Acres.	Acres.	Acres.	Acres.	Acres.	Acres.	Acres.
Mongonui	6,724	24,827	124	1,483	65	195	3
Whangaroa ..	933	5,709	..	108	27	93	4
Bay of Islands ..	5,267	32,561	20	1,011	81	255	23
Hokianga	559	25,359	8	846	134	318	48
Rodney	11,432	85,799	439	1,118	138	1,339	110
Whangarei ..	22,292	99,087	349	2,143	94	1,225	44
Otamatea	8,597	69,051	331	537	51	327	32
Hobson	2,081	40,614	136	481	86	171	61
Waitemata ..	23,982	34,523	1,113	1,947	286	2,228	269
Eden	16,626	4,769	107	1,369	1,177	548	324
Manukau	115,785	104,734	4,118	20,456	356	1,523	566
Coromandel ..	4,377	17,881	26	454	71	120	3
Thames	4,828	9,191	32	955	63	388	3
Ohinemuri ..	8,744	10,098	170	1,394	287	137	66
Waikato	55,455	24,831	1,355	12,171	97	514	4,622
Raglan	17,190	94,634	116	4,162	28	237	82
Waipa	65,414	12,461	211	13,397	101	643	616
Piako	132,560	43,754	340	24,353	103	317	1,024
West Taupo and Kawhia	17,907	77,680	252	4,170	72	93	108
East Taupo and Rotorua	3,902	9,924	157	1,140	65	60	694
Tauranga	37,760	22,565	254	9,196	94	454	93
Whakatane ..	6,232	10,428	299	2,571	8	46	11
Opotiki	12,946	13,937	125	4,937	36	72	7
Waiapu	2,516	186,809	..	1,810	66	134	20
Cook	34,404	536,312	37	8,588	173	520	312
Wairoa	20,211	306,988	95	3,244	173	193	238
Hawke's Bay ..	197,284	381,776	112	19,151	640	860	2,026
Waipawa	88,195	319,558	..	14,533	226	208	1,611
Woodville	7,432	84,634	..	1,289	21	195	94
Parangata and Weber	81,965	318,022	60	5,018	99	104	714
Clifton	14,936	55,175	..	2,888	110	92	8
Taranaki	47,733	94,952	5	5,881	400	352	331
Egmont	16,056	71,836	..	1,784	45	45	31
Stratford	2,890	173,334	..	1,603	82	12	19
Hawera	44,897	139,943	100	8,416	246	156	241
Patea	41,707	122,690	366	5,326	70	191	417
Waitotara	19,850	82,447	34	3,208	189	237	158
Wanganui	16,393	166,754	43	3,671	110	271	298
Waimarino ..	83	25,255	..	571	43	44	49
Rangitikei	62,954	230,737	161	16,247	158	378	963
Kiwitea	2,587	140,569	165	3,049	14	159	43
Pohangina ..	209	87,445	16	631	8	185	8
Oroua	10,686	91,889	..	7,466	69	350	142
Kairanga	11,332	75,891	178	5,527	234	484	210
Manawatu	35,667	63,362	..	13,845	90	140	374
Horowhenua ..	6,050	98,846	70	3,166	151	331	86
Hutt	6,270	157,104	18	1,950	721	325	428
Featherston ..	44,466	170,724	285	11,363	76	131	841

ACREAGE UNDER SOWN GRASSES, ETC.—*continued.*

Counties.	In Sown Grasses, after having been ploughed.	In Sown Grasses, not previously ploughed.	Land broken up but not under Crop.	Total under Crop.	In Garden.	In Orchard.	Plantations of Forest Trees.
	Acres.	Acres.	Acres.	Acres.	Acres.	Acres.	Acres.
Wairarapa South ..	19,555	188,543	73	8,493	64	162	246
Masterton	28,113	298,422	40	12,416	186	180	315
Castlepoint ..	2,916	88,793	..	615	19	25	144
Akitio	716	115,775	..	245	44	18	36
Pahiatua	1,513	141,782	18	1,335	65	258	61
Eketahuna ..	1,851	60,372	...	673	40	60	16
Mauriceville ..	488	40,722	..	201	14	9	9
Marlborough ..	58,875	104,381	295	31,042	167	290	1,187
Sounds	3,292	100,920	10	1,587	62	202	33
Kaikoura	31,321	61,459	..	3,309	29	24	60
Collingwood ..	3,767	38,194	44	1,370	12	300	7
Waimea	29,902	158,324	191	22,153	242	2,576	262
Buller	739	7,590	15	145	61	119	..
Inangahua ..	7,410	17,741	..	857	3	75	2
Amuri	48,375	75,683	202	9,641	70	41	1,027
Cheviot	25,210	3,518	89	8,752	55	83	320
Grey	5,304	18,849	..	428	50	67	3
Westland	4,606	31,415	40	551	14	71	4
Ashley	247,978	133,315	2,290	96,123	649	398	2,403
Selwyn	298,183	17,179	2,038	139,883	2,153	1,317	5,796
Akaroa	25,070	166,987	1	3,729	169	399	387
Ashburton	407,728	16,009	3,269	170,264	742	428	9,868
Geraldine	132,508	14,737	1,505	57,705	276	201	1,249
Levels	81,230	826	1,749	37,852	353	215	923
Waimate	216,557	23,349	2,672	76,303	409	150	706
Mackenzie	59,289	6,108	838	15,361	97	43	679
Waitaki	201,717	102,007	1,401	68,446	372	262	1,126
Waihemo	33,678	6,911	256	10,921	72	70	108
Waikouaiti ..	19,156	46,175	93	7,027	54	98	108
Peninsula	3,118	13,132	5	1,523	215	33	37
Taieri	83,315	12,233	453	26,546	569	328	456
Bruce	103,422	9,088	492	37,938	191	68	304
Clutha	180,839	35,098	2,175	51,540	357	154	504
Tuapeka	99,200	10,951	1,481	34,060	210	414	1,183
Maniototo	47,715	1,358	622	22,797	205	24	224
Vincent	22,505	1,691	2,390	13,990	116	226	98
Lake	12,200	6,338	5,484	11,680	109	74	278
Southland	514,874	65,930	10,610	188,568	1,072	572	1,157
Wallace and Fiord ..	144,506	42,305	8,401	57,061	182	103	300
Stewart Island ..	58	327	..	10	8	4	2
Totals	4,607,165	7,342,006	61,069	1,493,764	17,511	27,541	50,103

The extent of land in cultivation (including sown grasses and land broken up but not under crop) amounted to 13,549,056 acres. Of this area, land under artificial grasses comprised 88·19 per cent.; land under grain-crops, 5·21 per cent.; land under root and green crops, 5·82 per cent.; land in garden and orchard, 0·33 per cent.; and land in fallow, 0·45 per cent. Full details for the last seventeen years are tabulated.

NUMBER OF ACRES IN GRASS, UNDER EACH CLASS OF CROP, AND IN BARE FALLOW, 1888 TO 1904.

Year.	In Grass or Clover, sown after Land ploughed.	In Grass or Clover, surface-sown: Land not ploughed.	In Hay, included in either or both of the Previous Columns.	In Bare Fallow.	In Grain-crops.	In Green and other Crops.	In Garden.	In Orchard or Vineyard.	Total in Grass, Crop, Fallow, Garden, and Orchard.	In Plantations of Forest Trees.
1888	2,884,007	3,053,052	67,812	154,266	738,603	454,824	8,608	16,329	7,309,689	28,565
1889	2,941,888	3,337,423	50,656	142,747	793,866	454,243	8,561	15,246	7,693,974	33,938
1890	3,027,912	3,497,137	45,889	149,979	826,505	513,893	8,568	15,771	8,039,765	28,928
1891	3,250,543	3,715,675	44,045	210,509	703,329	582,439	9,810	17,047	8,489,352	35,310
1892	3,327,755	4,076,126	46,652	140,454	769,778	579,112	9,608	19,627	8,922,460	38,723
1893	3,611,393	4,650,652	61,811	154,254	753,091	544,355	9,763	20,085	9,743,593	40,401
1894	3,865,348	4,833,549	60,740	142,342	669,850	551,962	9,951	21,109	10,094,111	39,826
1895	3,908,581	4,921,136	56,614	140,494	560,179	597,686	10,263	21,401	10,159,740	55,386
1896	4,254,983	5,030,247	96,818	58,039	674,850	680,750	17,749	19,362	10,735,980	43,246
1897	4,308,720	5,733,138	109,466	57,158	688,297	762,762	16,924	22,291	11,589,290	47,630
1898	4,123,304	5,743,245	67,865	60,792	727,038	790,184	16,177	22,387	11,483,127	52,546
1899	4,065,860	6,178,879	75,620	51,164	892,468	796,235	16,930	22,983	12,024,519	47,216
1900	4,337,594	6,515,708	68,234	78,751	745,685	796,773	16,890	24,401	12,515,802	48,942
1901	4,425,738	6,656,174	68,023	67,747	721,325	765,051	17,411	25,777	12,679,223	49,394
1902	4,695,200	6,924,978	62,984	55,947	634,879	772,967	17,684	26,836	13,128,491	48,770
1903	4,558,346	7,249,869	69,342	44,494	736,683	768,308	17,632	27,191	13,402,523	53,788
1904	4,607,165	7,342,006	77,167	61,069	705,443	788,321	17,511	27,541	13,549,056	50,103

Wheat.

The wheat harvest of 1904 showed an average yield of 34·26 bushels per acre, the crop realised being 7,891,654 bushels, against 7,457,915 bushels in 1903.

The quantity of wheat of the previous season's harvest held by farmers in October, 1903, as shown by the gazetted figures, was 2,245,299 bushels, an amount which excludes stocks of grain and flour held by merchants and millers. The total amount of wheat exported during the year 1903 was 71,700 bushels, while the imports were 40 bushels, most probably for seeding purposes.

The imports of flour during 1903 were 34,201 centals (1,710 tons), and the exports 265 tons.

The area under wheat for threshing increased from 194,355 acres in 1903 to 230,346 acres in 1904; and this increase of 35,991 acres was shared by all the provincial districts. In addition to the area cut for threshing, 457 acres were cut for chaff, and 156 acres for ensilage and feeding down with stock, so that the total area sown in wheat was 230,959 acres.

Of the 230,346 acres in wheat (for threshing) this year, no less than 158,792 acres were in Canterbury and 52,302 acres in Otago.

The area under wheat for grain, the estimated gross produce in bushels, and the average yield per acre for each of the last fourteen years were :—

Year.	Land under Wheat.	Estimated Gross Produce.	Average Yield per Acre.
	Acres.	Bushels.	Bushels.
1891	301,460	5,723,610	18·99
1892	402,273	10,257,738	25·50
1893	381,245	8,378,217	21·98
1894	242,737	4,891,695	20·15
1895	148,575	3,613,037	24·32
1896	245,441	6,843,768	27·88
1897	258,608	5,926,523	22·92
1898	315,801	5,670,017	17·95
1899	399,034	13,073,416	32·76
1900	269,749	8,581,898	31·81
1901	206,465	6,527,154	31·61
1902	163,462	4,046,589	24·76
1903	194,355	7,457,915	38·37
1904	230,346	7,891,654	34·26

The following gives the area in wheat, and the estimated produce, for the Australian States for the season of 1903 :—

State.	Wheat-crop.		
	Acres.	Bushels.	Bushels per Acre.
Queensland	1,880	6,165	3·28
New South Wales	1,279,760	1,585,097	1·24
Victoria	1,994,271	2,569,364	1·29
South Australia	1,746,842	6,354,912	3·64
Western Australia	92,065	970,571	10·54
Tasmania	40,898	876,971	21·44

The Wheat-crop of the World.

The estimated wheat-crop of the world for five years is taken from figures published in the *Statist* of 30th August, 1902 (in bushels of 60 lb., 000's omitted).

	1902.	1901.	1900.	1899.	1898.
Austria	46,000	44,000	40,800	49,600	46,400
Hungary*	176,000	138,000	152,000	150,000	140,000
Belgium	14,000	12,000	12,000	12,000	14,000
Bulgaria	40,000	32,000	24,000	28,000	40,000
Denmark	3,200	2,000	2,600	4,000	4,000
France	336,000	304,000	325,200	366,000	364,000
Germany	140,000	96,000	156,000	157,600	150,400
Greece	6,000	5,200	6,000	6,000	6,000
Holland	6,000	5,200	4,000	5,200	4,800
Italy	116,000	128,000	116,000	134,000	132,000
Portugal	6,000	4,800	4,000	4,000	6,000
Roumania	72,000	70,000	54,000	26,000	56,000
Russia†	376,000	344,000	328,000	344,000	352,000
Caucasus	56,000	56,000	56,000	52,000	48,000
Servia	12,000	10,000	8,000	13,200	12,000
Spain	108,000	112,000	98,000	95,200	120,000
Sweden	4,000	4,000	4,000	4,000	4,400
Switzerland	4,000	4,000	4,000	4,000	4,000
Turkey (Europe) ..	40,000	32,000	32,000	24,000	28,000
United Kingdom ..	52,000	56,000	54,400	66,000	80,000
Totals for Europe ..	1,613,200	1,459,200	1,481,000	1,544,800	1,612,000
Algeria .. .	28,000	26,000	24,000	20,000	28,000
Tunis	8,000	8,000	10,000	8,000	6,000
Argentine Republic ..	80,000	56,000	68,000	104,000	96,000
Australasia	32,000	43,200	55,200	44,000	54,000
Asia Minor	40,000	40,000	40,000	40,000	48,000
Canada	96,000	88,000	52,000	64,000	64,000
Cape Colony	4,000	2,000	4,000	4,000	4,400
Chili	12,000	8,800	8,000	12,000	16,000
Egypt	12,000	10,000	8,800	10,000	10,000
India	224,000	252,000	184,000	236,000	248,000
Persia	20,000	20,000	24,000	20,000	20,000
Syria	20,000	16,000	16,000	12,000	12,000
United States of America	656,000	752,000	600,000	656,000	720,000
Uruguay	8,000	6,000	6,000	7,200	12,000
Mexico	14,000	14,000	12,000	12,000	12,000
Totals out of Europe	1,254,000	1,342,000	1,112,000	1,249,200	1,350,400
Grand total ..	2,867,200	2,801,200	2,593,000	2,794,000	2,962,400

* Including Slavonia and Croatia. † Including Poland and Siberia.

Consumption of Wheat.

The yearly consumption of wheat per head of population in New Zealand has been estimated at 6 bushels, and the quantity required for seed at 2 bushels to the acre.

Using these figures, the Department of Agriculture estimates that there will be a large surplus quantity after providing for this year's wants.

WHEAT: ESTIMATED SURPLUS, 1904.

	Bushels.	Bushels.
The area for threshing was 230,346 acres, and the total yield is computed at		7,891,654
Amount of wheat and flour returned on hand, 31st October, 1903 (as per returns)		2,245,299
Amount of wheat and flour imported from 1st November, 1903, to 29th February, 1904		3,600
		10,140,553
Wheat and flour exported from 1st November, 1903, to 29th February, 1904	189,167	
Consumption for same period for population of 870,000, at the rate of 6 bushels per head per annum	1,740,000	
		1,929,167
Leaving available for all purposes as at 29th February, 1904		8,211,386
Estimated quantity required for seed (say, 250,000 acres at 2 bushels per acre)	500,000	
Estimated consumption of 890,000 persons, at 6 bushels per head, from 1st March, 1904, to 28th February, 1905	5,340,000	
		5,840,000
Apparent surplus		2,371,386

The difficulty of correctly computing the consumption o breadstuffs is shown by the great differences in the estimates arrived at.

The average quantity required per head of the population (exclusive of that used for seed) has been calculated at 5·9 bushels for New South Wales, and 5·2 bushels for Victoria, by statisticians in those States.

The average consumption of wheaten breadstuffs in New Zealand thus appears to be somewhat higher than in New South Wales and Victoria.

The following is the average annual consumption of wheat per inhabitant in some of the principal countries of the world :—

United Kingdom	5·6 bushels.
Canada	6·6 "
France	8·1 "
Germany	3·0 "
Russia	2·1 "
Italy	5·4 "
United States	4·5 "

The English consumption during the last twenty-five years appears to have ranged from 5½ to 6 bushels per head of population.

Oats.

The extent of land in oats sown for grain in 1904 was 409,390 acres, against 483,659 acres in the preceding year, a decrease of 74,269 acres. The Provincial Districts of Otago (197,807 acres) and Canterbury (162,088 acres) account for 359,895 acres of the total area, Wellington taking third place with 23,368 acres. The breadth of land in oats for chaffing, ensilage, or feeding down with stock was 211,408 acres, an increase of 6,051 acres on the figures for 1903.

Owing to the prevalence of rust last season in the North Island 17,750 acres of oats sown for grain were not harvested, so that the yield per acre is calculated on an area of 391,640 acres.

The average yield per acre was, in 1904, 38·57 bushels, and in 1903, 45 bushels, the quantity of produce decreasing from 21,766,708 bushels to 15,107,237 bushels.

The oat-crop for 1903 in the Australian States was as follows:—

	Acres.	Bushels.	Average per Acre.
Queensland	78	520	6·66
New South Wales ..	42,992	351,758	8·18
Victoria	433,489	4,402,982	10·16
South Australia ..	50,296	620,823	12·34
Western Australia ..	10,180	161,714	15·88
Tasmania	55,058	1,752,745	31·83

Maize.

This is a crop of some importance. In 1904 there were 11,156 acres sown for grain, the yield being 530,291 bushels of corn, an average of 47·53 bushels per acre, and 1,763 acres sown for chaffing, ensilage, or feeding down with stock. Maize is grown only in the North Island, with the exception of a few acres in Nelson and Canterbury. The Provincial District of Auckland had 11,877 acres; Hawke's Bay, 626 acres; Taranaki, 176 acres; and Wellington, 211 acres, in 1904. As considerable interest is taken in this crop, the group of counties where it is chiefly grown is stated—viz., Hobson, Manukau, Thames, Rodney, Whangarei, Mongonui, Waikato, Waipa, West Taupo and Kawhia, Hokianga, Tauranga, Whakatane, Opotiki, Waiapu, Cook, Wairoa, and Hawke's Bay. Small acreages are found in all the counties of the Auckland, and in most of the counties in the Taranaki, Hawke's Bay, and Wellington Districts.

Barley.

Under barley (for threshing), 34,681 acres were returned in 1904, the crop being 1,160,504 bushels, an average yield per acre of 33·46 bushels. In 1903 the area under barley was 27,921 acres, and the yield 1,136,232 bushels, or 40·69 bushels per acre. There were in addition 2,581 acres in barley for ensilage or feeding down with stock.

Rye.

There were 1,176 acres in rye, yielding 19,992 bushels, or at the rate of 17 bushels per acre, in 1904, against 1,279 acres and 38,370 bushels, the rate being 30 bushels per acre, in 1903.

Peas and Beans.

The area under peas for threshing in the season 1904 was 10,328 acres, yielding 311,412 bushels, or an average of 30·15 bushels per acre, against 8,600 acres and 300,675 bushels, or 34·96 bushels per acre, in the previous year.

Under beans there were 2,646 acres, giving a return of 78,421 bushels, the average being 29·64 bushels per acre, against 3,037 acres and 90,346 bushels (29·71 bushels per acre) in 1903.

Potatoes.

The area under potatoes was 31,778 acres in 1904, yielding the return of 208,787 tons, or a rate of 6·57 tons per acre, against 31,408 acres in 1903, and 193,267 tons (or 6·15 tons per acre), an increase of 370 acres and 15,520 tons.

A comparison of the gross yield of potatoes with the amount exported in each of the twelve years 1883–94 showed that for such period an average of 597 lb. per head of population was retained in the colony. Allowing for waste, pig-feed, and seed, the average amount retained for human consumption was found to be 449 lb. a head.

Turnips, &c.

Turnips and rape form a most important crop in a sheep-breeding country such as New Zealand, and in 1892 the area of land under this crop amounted to 422,359 acres. The returns for 1895 gave only 385,788 acres, but for the present year 527,321 acres (408,659 acres in turnips and 118,662 in rape) were set down as under these crops; and there were 10,540 acres in addition, in mangolds (7,808 acres), beet (932 acres), and carrots (1,800 acres).

Hops.

There were 810 acres under hops in 1904, as against 790 acres last year. No account of the produce for the last nine years was taken, but in 1895 the yield was 7,556 cwt. In 1900 the total quantity used by the breweries in the colony amounted to 5,020 cwt. Of the land under hops in 1904, 734 acres were in the Waimea County and 61 in Collingwood, both in the Provincial District of Nelson. The import of hops in 1903 amounted to 708 cwt., and the exports, the produce of the colony, to 3,873 cwt.

Tobacco.

The growing of tobacco does not progress in New Zealand. In 1889, 34 acres were being cultivated; in 1890, 25 acres; in 1891, 16 acres; in 1892, 6 acres; in 1893, 4 acres; in 1894, 4 acres; and in 1895, 5 acres, producing 1,599 lb. of dried leaf. Statistics of this crop have not been taken since 1895.

Gardens and Orchards.

The extent of land in garden was 17,511 acres, of which 13,642 acres were private gardens and 3,869 acres market gardens. In plantations of forest trees there were 50,103 acres.

There were 26,792 acres in orchard in 1904, an increase of 306 acres on the area so returned in the previous year, and 749 acres were returned as "vineyard." The fruit-crop of the colony is supplemented by a considerable import from the Australian States and Fiji.

Sown Grasses and Seeds.

New Zealand is essentially suited for grazing purposes. Wherever there is light and moisture English grasses thrive when the natural bush and fern are cleared off—in fact, the white clover gradually overcomes the fern; and, from the mildness of the winter season, there are few places where there is not some growth, even in the coldest months of the year. In all parts of the colony stock live, although in varying condition, without other food than such as they can pick up. Sown-grass land, as might be expected, heads the list of cultivations.

At the beginning of the year 1904 there were 11,949,171 acres under artificial grasses. Of these, 4,607,165 acres had been previously ploughed, presumably under grain or other crops, while 7,342,006 acres had not been ploughed. Much of the latter area was bush or forest land, sown down in grass after the timber had been wholly or partially burnt off.

The area under ryegrass for seed in the season of 1904 was 29,350 acres, yielding 658,280 bushels of 20 lb., or a rate of 22·43 bushels per acre, against 27,881 acres and 576,931 bushels, an average of 20·69 bushels per acre, in 1903.

In cocksfoot there were 29,590 acres, which yielded 5,228,572 lb., or an average of 176·70 lb. per acre, against 27,884 acres and 6,786,844 lb. (a rate of 243 lb. per acre) in the previous year.

Seeds for sowing pasture lands are used much as in Great Britain, the following being a common mixture: Perennial ryegrass, 25 lb. to 30 lb. per acre; cocksfoot, 2 lb.; alsike, 2 lb.; timothy, 3 lb.; cowgrass, 2 lb.; red clover, 2 lb.; white clover, 2 lb.; rape, 1 lb.: total, 39 lb. to 44 lb. per acre. Pastures are renewed at intervals of from four to eight years, according to the nature of the land.

The following shows the acreage in sown grasses in Australasia in 1902–1903:—

	Acres.
Queensland	24,286
New South Wales	477,629
Victoria	565,635
South Australia	23,636
Western Australia (1902)	11,132
Tasmania	319,090
New Zealand	11,808,215

It will be observed that the acreage of land under sown grasses was nearly nine times as great in New Zealand as in the whole of Australia and Tasmania. When compared in size with the States of Australia, New Zealand is not large — about one-thirtieth of their total area—but in respect of grazing capabilities the relative importance of this country is much greater. Australia is generally unsuitable, owing to conditions of climate, for the growth of English grasses, and the amount of feed produced by the natural grasses throughout the year is very much less per acre than is obtained from the sown-grass lands in New Zealand; indeed, it may be said that the average productiveness of grass-land is about nine times as great here as in Australia, or, in other words, that land in this colony covered with English grasses may be considered equal for grazing purposes to an area of Australian land about nine times as great.

In addition to the artificially sown pastures, the returns for 1904 show that 22,877,322 acres of unimproved land, including that in tussock or native grass, belonged to the occupied holdings, and were available for stock-feeding by the sheep-farmers and cattle-farmers of the colony.

SECTION XIV.—LABOUR LAWS.

The legislation passed by the General Assembly of New Zealand and termed the "labour laws" comprises the undermentioned statutes and regulations made under various Acts:—

"The Accident Insurance Companies Act, 1902."
"The Accidents Compensation Act, 1901."
"The Alcoholic Liquors Sale Control Act Amendment Act, 1895": Section 10.
Bankruptcy: Sections 112 and 120 of Act of 1892.
"The Bank Holidays Act. 1902."
"The Coal-mines Act, 1891": Sections 18 to 58 and 64 to 88.
"The Coal-mines Act Amendment Act, 1901": Sections 3, 4, and 6.
"The Coal-mines Act Amendment Act, 1903": Sections 1 to 10 and Section 12.
"The Companies Acts Amendment Act, 1893": Sections 8 and 9.
"The Conspiracy Law Amendment Act, 1894."
"The Contractors' and Workmen's Lien Act, 1892."
"The Criminal Code Act, 1893": Sections 150 and 213.
"The Deaths by Accidents Compensation Act, 1880."
"The Electoral Act Amendment Act, 1900": Section 10.
"The Employers' Liability Act, 1882," with amendments of 1891 and 1892.
"The Factories Act, 1901," with amendments of 1902.
"The Industrial Conciliation and Arbitration Act, 1900," with amendments of 1901 and 1903 (also "The Arbitration Court Emergency Act, 1903").
"The Inspection of Machinery Act, 1902," with amendment of 1903.
"The Kauri-gum Industry Act, 1898," and Amendment Acts of 1899, 1902, and 1903.
"The Labour Day Act, 1899."
"The Labour Department Act, 1903."
"The Land for Settlements Act Amendment Act, 1896" (provision for workmen's homes).
"The Legitimation Act, 1894": Section 6.
"The Licensing Act, 1881": Section 131.
"The Master and Apprentice Act, 1865." Master and Apprentice: Extract from "The Criminal Code Act, 1893," sections 150 and 213.
"The Mining Act, 1898," and Amendment Acts, 1900, 1901, 1902, and 1903.
"The Public Contracts Act, 1900."
"The Servants' Registry Offices Act, 1895."
"The Shearers' Accommodation Act, 1898."
"The Shipping and Seamen Act, 1903."
"The Shops and Shop-assistants Act, 1894," with Amendment Acts of 1895, 1896, and 1901.
"The Sunday Labour in Mines Prevention Act, 1897."
"The Threshing-machine Owners' Lien Act, 1895."
"The Trade-Union Act, 1878," and Amendment Act, 1896.
"The Truck Act, 1891."
"The Wages Attachment Act, 1895."
"The Wages Protection Act, 1899" (forming part of and to be read with "The Truck Act, 1891").
"The Workers' Compensation for Accidents Act, 1900," with amendments of 1902 and 1903.
"The Workmen's Wages Act, 1893."

The labour laws have been passed in the effort to regulate certain conditions affecting employer and employed. Their scope embraces many difficult positions into which the exigencies of modern industrial life have forced those engaged in trades and handicrafts. The general tendency of these laws is to ameliorate the position of the worker by preventing social oppression through undue influences, or through unsatisfactory conditions of sanitation. It will undoubtedly be found that, with the advance of time, these laws are capable of improvement and amendment; but they have already done much to make the lives of operatives of fuller and more healthy growth, and their aim is to prevent the installation of abuses before such abuses attain formidable dimensions.

The manufacturing population in New Zealand differs from that in some of the Australian States by its wide dispersion. The capital city has hitherto been unable to draw to itself the industrial ability of the other provincial centres; and not only do Auckland, Christchurch, and Dunedin vie with Wellington as centres of population, but also as *nuclei* of commercial activity. In the second-class towns, such as Nelson, Napier, Invercargill, &c., many important works are being carried on, while even in the villages and rural districts the progress of new settlement necessitates the manufacture of articles which in older communities are produced in specialised localities. Men scattered widely at the numerous occupations of colonial country life, shearing, harvesting, bushfelling, road-making, or sailing coastal vessels, &c., require legal protection against the dangers and disabilities to which their callings expose them. This general dispersion of industry necessitates not only a wide system of supervision, but legislative measures of a peculiar character, at once sufficiently elastic to comprehend many varieties of function, and yet rigid to crush any apparent abuse.

The most important of these laws, in its general significance, is that dealing with compulsory arbitration in labour disputes. "The Industrial Conciliation and Arbitration Act, 1894" (with its amending Acts of 1895, 1896, and 1898), were consolidated and further amended by the Acts of 1900, 1901, and 1903, now in force, and which are for the purpose of encouraging industrial association, and to facilitate the settlement of trade difficulties. Societies consisting of two or more employers, or of seven or more workers, may be registered and become subject to the jurisdiction of the Board and Court appointed by the Act of 1900. Any such society, after complying with stated conditions, may bring a disputed case before the Board of Conciliation appointed for that industrial district, and, if the Board fails to effect a settlement, the dispute may be referred to the Court of Arbitration, whose award may be enforced in the same manner as an award of the Supreme Court. The amending Act of 1901 gives the right to either party to a trade dispute to refer the matter directly to the Arbitration Court. The amount for which such an award may be enforced against an association is limited to £500. The amendment of 1903 empowers the Arbitration Court to extend an award to another industrial district under special circumstances. It also deals with conspiracies or combinations for the purpose of defeating any of the provisions of an award, and aims at protecting workers against dismissal merely because they are entitled to the benefit of an award. Inspectors of Awards are appointed, with certain powers necessary for the performance of their duties.

"The Factories Act, 1901," is a consolidation of previous legislation, with some important amendments. New Zealand has been divided into factory districts under the charge of a Chief Inspector and 150 local Inspectors. As a "factory" or "workroom" includes any place in which two or more persons are engaged in working for hire or reward in any handicraft, there are few operatives who do not come within the scope of the Act. Children under fourteen years of age are not allowed to be employed, and the hours of labour, holidays, &c., of women and youths under sixteen are strictly regulated. Good ventilation, sanitary accommodation, and general cleanliness of buildings are points dwelt upon; while machinery has to be properly guarded, fire-escapes provided, and dangerous occupations especially classified. In order to assist the system of free general education which prevails in the colony, young persons are not allowed to work in factories till they have passed the Fourth Standard of the State schools, or

an equivalent examination. To prevent the introduction of "sweating" into our commercial centres, articles made, or partly made, in private dwellings, or unregistered workshops, have to be labelled when offered for sale, so that goods so manufactured (often in unsanitary premises) may not be placed in the market in competition with work done in properly inspected factories. Any person removing such labels is liable to a heavy fine. The Factory Inspectors also exercise supervision over the sleeping accommodation provided for shearers in country districts. As the sheep-runs and farms are widely scattered, sometimes in the rough and remote back country, this part of the work of inspection is no easy task. A woman Inspector of Factories also gives her assistance to the duties of the Department, travelling from place to place, and particularly looking into the condition of the operative women and girls. There is an amendment Act, passed in 1902, relative to the granting of overtime permits, the minimum wages of persons under twenty years of age, and the health of persons working in the manufacture of textile fabrics.

The duration of the hours of business in shops is limited by "The Shops and Shop-assistants Act, 1894," and the Shops and Shop-assistants Act Amendment Acts, 1895, 1896, and 1901. These provide for the closing of all shops in towns and boroughs for one afternoon half-holiday in each week. A few shops, such as those of fishmongers, fruiterers, eating-house keepers, &c., are exempted from the general closing on account of their convenience to the public; but assistants in such establishments, in the bars of hotels, and in country stores, must have a half-holiday on some day of the week. Very small shops carried on by Europeans without paid assistants are also exempt from closing on the general half-holiday, but must close on one afternoon in each week. The hours of work for women and young persons are defined; sitting accommodation must be provided, and precautions as to the necessary time for meals, sanitary accommodation, &c., are enforced; the Act also enumerates the working-hours, holidays, &c., of clerks employed in banks, mercantile offices, &c.

"The Employers' Liability Act, 1882," added to and amended in 1891 and 1892, is designed to protect workmen from negligence on the part of employers, by defining under what circumstances compensation for injury or death may be recoverable. The Act covers all employments except that of domestic servant, and does not allow of any "contracting out" by agreement on the part of employer and employed. Another Act of this character has regard to the payment of workmen's wages, and states that if a workman shall demand payment of wages twenty four hours or more after they are due, and the contractor does not pay such wages, the workman may legally attach all moneys due to the contractor by the employer until such wages are paid. "The Truck Act, 1891," requires that payment of wages shall not be made in goods or "truck," but in money, any contra account notwithstanding; but there are a few exemptions, such as for advances for food, tools, &c., to men engaged in felling bush. In order to minimise the number of cases wherein fraudulent or unfortunate contractors victimised their labourers, "The Contractors' and Workmen's Lien Act, 1892," was brought into existence. This entitles a person who has done work upon any land, building, or chattel to a lien upon such property. The lien is only to be exercised under certain restrictions, and for a limited amount, but it gives priority of claim for wages against other service, and enables legal proceedings for recovery to be taken before the attached property can be disposed of or alienated.

"The Workers' Compensation for Accidents Act, 1900," will probably almost altogether supersede the Employers' Liability Act, because, while an accident to a workman had not to be compensated by an employer under the latter Act unless it had occurred through his carelessness or that of his agent, under the former all accidents are to be compensated unless they are caused by the serious and wilful misconduct of the person injured. To meet the difficulty of too great expense falling on an employer through his having to pay large accident compensation, "The Government Accident Insurance Act, 1899" was passed, which insures employers against risk of paying compensation. "The Workers' Compensation for Accidents Act Amendment Act, 1902," extends the application of the principal Act to workers in all branches of agriculture, while the Amend-

ment Act of 1903 provides that no payment shall be made for the first week in any case where the partial incapacity of the worker does not continue for a longer period than two weeks, and confers the benefits of the principal Act on illegitimate offspring.

"The Accidents Compensation Act, 1901," provides that an independent medical examination of the injured person may be ordered by the Judge before whom a claim of compensation for accident is brought.

"The Servants' Registry Offices Act, 1895," regulates the licensing of registry offices for domestic or farm servants. It prevents friendless or uneducated people from becoming the prey of unscrupulous persons, who formerly collected fees by duping the applicants for situations. The registry-office keepers have to pay a licensing fee to the Government, and to present a certificate of good character when applying for a license. Proper ledgers and books open to inspection must be provided, and the lending or hiring of licenses is not permitted. Registry-office keepers are not allowed to keep lodging-houses for servants, or have any interest in such houses.

The laws relating to shipping and seamen have been consolidated and amended by "The Shipping and Seamen Act, 1903." All matters connected with the survey and inspection of ships, certificates and examination of officers, apprenticeship, engagement, rating, and discharge of seamen, payment of wages, provisions, health, accommodation, discipline, &c., are dealt with. The appointment of pilots, safety of crew and passengers, shipping inquiries and courts, wreck and salvage, lighthouses, liability of shipowners, and registration of shipping are all provided for.

Combinations or associations of persons for regulating the relations between masters and masters, or masters and workmen, or workmen and workmen, are directed by "The Trade Union Act, 1878." In this Act the different statutes which do not apply to trade-unions (such as the Joint Stock Act, the Friendly Societies Act, &c.) are enumerated, and the manner in which such societies may register, hold property, &c., is set out, together with the necessary provisions as to returns, penalties, &c. [An Amendment Act was passed in 1896, altering the age of membership.] "The Conspiracy Law Amendment Act, 1894," permits any combination of persons in furtherance of a trade dispute, provided that any act performed by such combination or society would not be unlawful if done by one person. Such action must not include riot, sedition, or crime against the State.

"The Wages Attachment Act, 1895," prevents wages below £2 a week being attached for debt. It does not interfere with any workman being sued for debt in the ordinary course, but prevents a grasping creditor from stepping in before others and seizing wages in advance before they are earned. [There is also "The Wages Protection Act, 1899," which has to be read with "The Truck Act, 1891," previously alluded to.]

"The Master and Apprentice Act, 1865," applies mainly to the indenturing of apprentices by the State, such apprentices being children of destitute parents. In other respects the law of England is held to be the law governing the relations between masters and apprentices in this colony; but special sections of the Act apply to the punishment of apprentices for absenting themselves from duty, and to the fine on a master for neglecting or ill-using his apprentice. Sections 150 and 213 of "The Criminal Code Act, 1893," also relate to the proper care of apprentices by their masters.

"The Mining Act, 1898," consolidates and repeals all statutes of a similar nature, and includes various amendments suggested by the Conference of Wardens of Goldfields, and by mining associations. The mining legislation refers to labour in any kind of mine, and deals with the position of tributers and wagesmen, the examination for certificates for mine-managers, &c., provision for ventilation, precautions against accident by blasting, &c. There are amending Acts of 1900, 1901, 1902, and 1903, providing for the inspection of mines by workmen, limiting the number of hours of working underground, and making provision for the payment of overtime, and dealing with compensation for accidents in mines.

In or about coal-mines women and boys are not allowed to be engaged. There is provision for the appointment of inspectors, mine-managers, engine-drivers, &c., and rules are furnished as to the ages and working-hours of those employed in attending engines, machinery, winding-gear, &c. The ventilation of mines is provided for, and the necessary safeguards imposed as to blasting operations, working in foul air, protecting lights, &c. There are regulations for the management and administration of funds and moneys, which relate chiefly to the withdrawal of moneys from the Sick and Accident Fund, and returns demanded from trustees of the fund. An Act passed in 1903 fixes the working-day of any person employed underground in a mine at eight hours from the time of entering to the time of leaving the mine. This Act also deals with the recovery of compensation for accidents by miners, and with the establishment of coal-miners' medical clubs. State coal-mines are subject to the provisions of this Act.

There is also "The Deaths by Accident Compensation Act, 1880."

"The Public Contracts Act, 1900," provides that any person entering into a contract exceeding the value of twenty pounds with the Government, any Education Board, Harbour Board, or local authority, and employing skilled or unskilled manual labour in the execution of such contract, shall be bound to pay wages at the rate ruling in the locality of the work, but in no case lower than the rates fixed by the Arbitration Court. The maximum length of the working-day on any public contract is not to exceed eight hours. A penalty not exceeding £10 is recoverable by summary proceedings for every breach of the provisions of the Act.

"The Labour Department Act, 1903," provides for the creation of a Department of Labour, and defines the powers and duties thereof. The general duties of the Department shall be to administer the labour laws of New Zealand; to acquire and disseminate knowledge on all matters connected with the industrial occupations of the people, with a view of improving the relations between employers and workers; to collect and publish reliable information relating to or affecting the industries of the colony and rates of wages; and to perform such other duties as may from time to time be prescribed by any Act of the General Assembly.

The Department is empowered to obtain such information as will enable it to carry out the above duties, and penalties are provided for cases of refusal to furnish such returns as may lawfully be required by the Department.

Co-operative Public Works.

Remarks on the co-operative system of constructing public works were given in a special article in the Year-book of 1894. The numbers of workmen employed in this manner under Government Departments during each month of the financial year 1903–1904 were :—

Month.		Roads and Lands and Survey Departments.	Public Works Department.	Total.
April,	1903	2,532	3,084	5,616
May,	"	2,256	2,907	5,163
June,	"	1,959	2,649	4,608
July,	"	1,775	2,219	3,994
August,	"	1,390	2,291	3,681
September,	"	1,159	2,214	3,373
October,	"	1,004	2,108	3,112
November,	"	948	1,959	2,907
December,	"	869	1,921	2,790
January,	1904	976	2,026	3,002
February,	"	1,417	2,110	3,527
March,	"	1,635	2,173	3,808

The average number of men employed in each year was as follows:—

Year.	Roads and Lands and Survey Departments.	Public Works Department.	Total.
1891–92	261	527	788
1892–93	280	842	1,122
1893–94	933	1,015	1,948
1894–95	1,103	962	2,065
1895–96	1,572	764	2,336
1896–97	1,459	854	2,313
1897–98	1,552	890	2,442
1898–99	1,613	1,194	2,807
1899–1900	1,825	1,243	3,068
1900–1901	1,820	2,090	3,910
1901–1902	1,894	2,673	4,567
1902–1903	1,319	1,733	3,052
1903–1904	1,493	2,305	3,798
Annual average last thirteen years ..	1,317	1,315	2,632

Labour Department.

The total number of men for whom employment has been found by the Department of Labour up to the end of March, 1904, is given below. The statement also exhibits the number of persons dependent upon the men assisted:—

	Men.	Dependents.
June, 1891, to 31st March, 1892	2,593	4,729
1st April, 1892, to 31st March, 1893 ..	3,874	7,802
1st April, 1893, to 31st March, 1894 ..	3,341	7,942
1st April, 1894, to 31st March, 1895 ..	3,030	8,883
1st April, 1895, to 31st March, 1896 ..	2,871	8,424
1st April, 1896, to 31st March, 1897 ..	1,718	4,719
1st April, 1897, to 31st March, 1898 ..	2,035	4,928
1st April, 1898, to 31st March, 1899 ..	2,115	4,759
1st April, 1899, to 31st March, 1900 ..	2,147	4,471
1st April, 1900, to 31st March, 1901 ..	3,124	5,432
1st April, 1901, to 31st March, 1902 ..	1,830	2,747
1st April, 1902, to 31st March, 1903 ..	3,704	5,934
1st April, 1903, to 31st March, 1904 ..	2,875	3,237
	35,257	74,007

SECTION XV.—LOCAL GOVERNING BODIES.

Counties, Boroughs, etc.

For purposes of local government New Zealand is divide into counties and boroughs. Although the boroughs, of which there were 103* in March, 1903, lie geographically within the counties, yet by the law they are not considered as part of them. On the 31st March, 1903, the counties numbered 94. The number is increased from time to time as need is found for further division. In the year 1878 there were only 63 counties. Interior to the counties are the road and town districts, but much of the country is outlying, many road districts having been merged, especially on goldfields territory.

There were, however, 221 road districts (three without Boards) in existence in March, 1903, and 35 town districts. One of these latter is the special Town District of Rotorua, constituted under "The Thermal-Springs Districts Act, 1881." Besides the above there were 31 river protective districts (excluding Inch Clutha, in Bruce County, which is also a road district), 2 drainage districts (Christchurch and Dunedin), 2 water-supply districts, and 16 land drainage districts under the Land Drainage Act of 1893 (one without Board). The Harbour Boards numbered 25, excluding Coromandel, Fortrose, and Half-moon Bay, for which the County Councils of Coromandel, Southland, and Stewart Island act as the Harbour Boards.

These bodies levied rates in the financial year 1902–1903 to the amount of £846,716, of which £581,464 consisted of general rates, and £265,252 special and separate rates. The sum of £83,307 was raised by licenses, and £19,890 by other taxes, making £949,912 altogether, which sum is equivalent to £1 3s. 8d. per head of the mean European population. In the year 1901–1902 the local taxation was £1 2s. 11d. per head, or 9d. less than in 1902–1903.

It will be seen from the table on the next page that revenue derived from rates increased from £398,659 in 1883–84 to £846,716 in 1902–1903. Revenue from Government has, on the other hand decreased in the same period (twenty years) from £241,558 to £156,254. Receipts which cannot be classed as "revenue" were £331,994 in 1883–84, against £966,087 in 1902–1903; but these figures vary from year to year according to circumstances, such as large operations by way of construction of works, for which money has to be specially raised.

* In April, 1903, the Boroughs of Linwood, St. Albans, and Sydenham were incorporated in the City of Christchurch, and the Borough of Melrose became part of the City of Wellington.

The receipts (distinguishing revenue from other sources of income) and expenditure of the various local bodies, with the amount of rates collected, and the amount of indebtedness on account of loans for each of the past twenty years, are shown in the following table:—

LOCAL GOVERNING BODIES.—RATES, RECEIPTS, EXPENDITURE, AND LOANS, 1884 TO 1903.*

Year ended 31st March.	Receipts of Local Bodies.						Expenditure of Local Bodies.†	Outstanding Loans of Local Bodies (excluding Government Loans, for which see the following Columns).	Government Loans to Local Bodies.	
	Revenue from.				Receipts not Revenue.	Total Receipts.			Outstanding Debentures under "The Roads and Bridges Construction Act, 1882."	Net Indebtedness in February of each Year under "The Government Loans to Local Bodies Act, 1886" (including Debentures under the Roads and Bridges Construction Act, converted), and the Local Bodies' Loans Acts of 1901 and 1902.
	Rates.	Licenses, Tolls, Rents, and other Sources.	Government.	Total Revenue.						
	£	£	£	£	£	£	£	£	£	£
1884 ..	398,659	502,969	241,558	1,143,186	331,994	1,475,180	1,499,117	3,962,330	77,439	..
1885 ..	401,393	477,813	364,082	1,243,288	430,561	1,673,849	1,653,706	4,313,223	123,086‡	..
1886 ..	410,639	504,807	377,811	1,293,257	514,728	1,807,985	1,644,706	4,943,270	134,534	..
1887 ..	434,237	447,631	342,432	1,224,300	992,633	2,216,933	1,885,001	5,620,747	113,072	..
1888 ..	433,832	460,210	334,857	1,228,899	511,594	1,740,493	1,819,787	5,812,803	18,635	191,687
1889 ..	445,929	535,140	141,288	1,122,357	316,139	1,438,496	1,560,605	5,892,050	10,495	273,289
1890 ..	460,303	568,405	139,320	1,168,028	206,688	1,374,716	1,476,540	5,978,059	9,676	319,603
1891 ..	463,581	518,757	144,008	1,126,346	236,902	1,363,248	1,381,320	6,042,693	4,317	367,715
1892 ..	488,824	584,274	109,022	1,182,120	214,124	1,396,244	1,400,467	6,081,934	4,245	449,532
1893 ..	508,157	573,161	136,515	1,217,833	340,538	1,558,371	1,482,548	6,203,869	3,465	525,173
1894 ..	551,412	547,560	134,271	1,233,243	623,038	1,856,281	1,589,124	6,614,824	2,685	547,679
1895 ..	581,868	545,629	138,228	1,265,725	328,798	1,594,523	1,584,518	6,685,510	2,015	621,903
1896 ..	592,903	581,966	156,180	1,331,049	269,145	1,600,194	1,627,079	6,737,578	1,442	667,451
1897 ..	598,526	586,599	178,448	1,363,573	246,919	1,610,492	1,636,716	6,793,398	1,077	709,282
1898 ..	644,552	608,436	182,166	1,435,154	304,645	1,739,799	1,733,016	6,834,361	712	742,530
1899 ..	685,769	642,289	178,438	1,506,496	385,368	1,891,864	1,778,574	6,963,254	347	789,618
1900 ..	714,151	695,988	152,044	1,562,183	372,028	1,934,211	1,960,073	7,057,350	..	810,192
1901 ..	734,023	751,046	168,785	1,653,854	825,039	2,478,893	2,250,572	7,563,069	..	902,769
1902 ..	800,471	848,983	170,041	1,819,495	775,432	2,594,927	2,547,286	7,839,695	..	1,046,645
1903 ..	846,716	897,328	156,254	1,900,298	966,087	2,866,385	2,867,506	8,217,196	..	1,266,002

*The figures for the Christchurch Drainage Board and Harbour Boards (excepting Wellington, the last balance being for nine months ending the 30th September, 1902) included are for the calendar years ended three months previous to the financial years. †Not including balances, deposits, or amounts paid to sinking funds and for redemption of debentures. ‡On the 30th June.

The indebtedness of local governing bodies on account of outstanding loans has increased in twenty years from £3,962,330 to £8,217,196, exclusive of moneys borrowed from Government under "The Roads and Bridges Construction Act, 1882," "The Government Loans to Local Bodies Act, 1886," and the Local Bodies' Loans Acts, 1901 and 1902, which represented a further indebtedness of £1,266,002 at the end of March, 1903.

Taxation by Local Bodies.

Table showing the Revenue of Local Governing Bodies derived from Rates, Licenses, and other Taxes during the Year 1902–1903.

Local Bodies.	Rates.		Licenses.	Other Taxes.	Total.
	General.	Special and Separate.			
	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.
Counties* ...	213,580 0 2	56,385 18 11	20,567 17 11	11,725 5 1	302,259 2 1
Boroughs* ...	188,572 15 5	193,324 18 0	56,631 10 7	6,375 8 2	444,904 12 2
Town Boards* ...	3,779 13 1	329 2 4	3,531 6 5	342 1 11	7,982 3 9
Road Boards* ...	92,778 7 5	10,747 12 5	2,576 1 1	1,439 19 11	107,542 0 10
River Boards* ...	9,872 14 3	1,586 7 9	...	6 16 0	11,465 18 0
Land-drainage Boards* ...	3,119 9 0	987 6 0	...	...	4,106 15 0
Harbour Boards†	46,202 12 1	...	...	...	46,202 12 1‡
City and Suburban Drainage Boards† ...	23,557 15 5	336 1 6	...	...	23,893 16 11
Waimakariri-Ashley Water-supply Board*	...	1,554 16 9	...	...	1,554 16 9
Totals ...	581,463 6 10	265,252 3 8	83,306 16 0	19,889 11 1	949,911 17 7§

* For year ended 31st March, 1903. † Wellington Harbour Board, for nine months to 30th September, 1902; Christchurch Drainage Board, for year ended 31st December, 1902; Dunedin Drainage and Sewerage Board, for year ended 31st March, 1903. ‡ Wharfage dues, charges, fees, tolls, rents, &c., amounting to £400,214 5s. 9d., have not been classed as taxation. § Equal to £1 3s. 8d. per head of the mean European population of the colony for the financial year 1902–1903.

Receipts and Expenditure, 1902–1903.

A summary of all the transactions for the year 1902–1903 is given on pages 372 to 375. The total revenue of the local bodies for the financial year was £1,900,298, and they further received a sum of £966,087 which could not properly be termed "revenue," making altogether a grand total of receipts amounting to £2,866,385. The rates formed 45 per cent. of the revenue proper. Licenses, rents, and other sources yielded 47 per cent., and 8 per cent. was granted by the General Government.

While the revenue proper of the counties amounted to £419,785, of which those bodies raised £269,966 by way of rates, the Road Boards' revenue was only £150,641, out of which £103,526 represented the result of their rating. The boroughs had the far larger revenue of £768,589, including £381,898 of rates, and their receipts under the heading of licenses, rents, and other sources amounted to the considerable sum of £360,763. In the matter of receipts from Government, of which a table is printed on the next page, the counties received the bulk of the money.

The details of amounts received, representing Government support to the various bodies, are stated in the following table :—

LOCAL GOVERNING BODIES.—RECEIPTS FROM GOVERNMENT, 1902-1903.

—	Counties.	Boroughs.	Town Boards.	Road Boards.	River Boards (excluding Inch-Clutha, also Road Board).	Land Drainage Boards.	Harbour Boards.	Drainage Board.	Totals.
	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.
Rates on Crown and Native lands...	4 8 11	41 0 1	...	29 19 9	...	...	...	...	75 8 9
One-third receipts from land sold on deferred payment and from perpetual lease	17,999 18 11	...	3 16 3	6,030 3 8	...	...	...	...	24,063 18 10
One-fourth of rents from small grazing-runs	3,366 0 3	105 3 11	...	205 10 1	...	...	...	...	3,676 14 3
Goldfields revenue and gold duty ...	28,599 2 9	10,550 18 11	4 18 8	428 11 8	...	...	...	...	39,583 12 0
Subsidies under the Local Bodies' Finance and Powers Act ...	49,009 15 11	13,103 12 5	662 18 0	18,35 17 10	...	9 5 0	250 0 0	...	81,395 9 2
Fees and fines under the Financial Arrangements Act	873 6 8	386 11 10	12 6 0	17 8 1	...	...	...	...	1,289 12 7
Other receipts	142 15 1	1,74) 15 6	3,056 10 3	762 6 4	44 1 11	...	210 12 1	212 0 0	6,169 1 2
Total Revenue Account ...	99,995 8 6	25,928 2 8	3,740 9 2	25,863 17 5	44 1 11	9 5 0	460 12 1	212 0 0	156,253 16 9
Loans from Government under Local Bodies' Loans Acts ...	72,987 0 0	119,637 0 0	3,860 0 0	25,486 0 0	6,000 0 0	1,300 0 0	...	...	229,270 0 0
Grants for special works, &c. ...	93,640 5 8	4,394 10 7	210 0 0	7,325 2 9	920 12 3	100 0 0	832 13 6	...	107,423 4 9
Total receipts from Government	266,622 14 2	149,959 13 3	7,810 9 2	58,675 0 2	6,964 14 2	1,409 5 0	1,293 5 7	212 0 0	492,947 1 6

—	Financial Year ended 31st March, 1903.							
	Counties.	Boroughs.	Town Boards.	Road Boards.	River Boards (excluding Inch-Clutha, also Road Board).	Land Drainage Boards.	Waimakariri Water-supply Board.	Totals.
Receipts:—								
Revenue from—	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.
Rates	269,965 19 1	381,897 13 5	4,108 15 5	103,525 19 10	11,459 2 0	4,106 15 0	1,554 16 9	776,619 1 6
Licenses, rents, and other sources	49,824 0 8	360,763 8 8	6,440 13 4	12,417 6 5	4,710 1 10	261 0 11	1,348 17 10	435,765 9 8
Government*	99,995 8 6	25,928 2 8	3,740 9 2	25,863 17 5	44 1 11	9 5 0	...	155,581 4 8
County	...	...	601 3 4	8,834 0 3	75 1 0	...	...	9,510 4 7
Total revenue	419,785 8 3	768,589 4 9	14,891 1 3	150,641 3 11	16,288 6 9	4,377 0 11	2,903 14 7	1,377,476 0 5
Receipts not revenue ...	190,129 17 8	476,196 13 5	4,334 6 11	52,194 2 4	7,118 14 5	1,554 3 8	...	731,527 18 5
Total receipts	609,915 5 11	1,244,785 18 2	19,225 8 2	202,835 6 3	23,407 1 2	5,931 4 7	2,903 14 7	2,109,003 18 10
Expenditure:—								
Public works	449,022 19 11	669,682 6 5	12,720 11 11	148,768 1 11	18,730 6 8	4,168 6 11	1,487 1 2	1,304,579 14 11
Charitable aid and hospitals	44,508 15 4	30,869 18 0	310 6 5	10,056 5 1	...	...	...	85,745 4 10
Management	56,251 4 8	67,247 5 3	2,330 18 5	17,398 12 8	2,271 3 3	973 10 1	325 3 11	146,197 18 3
Other expenditure	78,801 6 4	491,165 7 6	3,208 11 6	29,567 11 11	8,554 9 4	1,083 1 5	1,074 8 2	613,454 16 2
Total expenditure ...	628,584 6 3	1,258,964 17 2	18,570 8 3	205,790 11 7	29,555 19 3	5,624 18 5	2,886 13 3	2,149,977 14 2
Liabilities (including loans, excepting those from Government)	220,324 6 1	3,982,739 4 3	1,771 15 6	38,272 11 0	44,997 0 9	2,174 11 10	22,428 0 9	4,312,707 10 2
Loans †	6,614 0 0	3,655,436 0 0	500 0 0	17,915 0 0	38,470 0 0	50 0 0	21,200 0 0	3,740,185 0 0‡

* For amounts under various heads see preceding table; also for specification of loans under Government Loans to Local Bodies Acts, and special grants, which are here included with "Receipts not revenue."

† Excluding loans under Roads and Bridges Construction Act and Loans to Local Bodies Acts, 1901 and 1902. (For rates of interest see page 377).

‡ Not including loans, amounting to £1,266,002 repayable by instalments under "The Roads and Bridges Construction Act, 1882," "The Government Loans to Local Bodies Act, 1886" and the Local Bodies' Loans Acts, 1901 and 1902.

NOTE.—The return of receipts and expenditure in this summary represents the *net* receipts and expenditure of the year, exclusive of credit and debit balances, bank overdrafts, deposits, amounts paid to sinking funds, and for redemption of debentures.

LOCAL GOVERNING BODIES.—RECEIPTS, EXPENDITURE, AND LOANS—*continued.*

—	Financial Year ended 31st December, 1902.		Totals—all Local Bodies.
	Harbour Boards.*	City and Suburban Drainage Boards.*	
Receipts:—			
Revenue from—	£ s. d.	£ s. d.	£ s. d.
Rates	46,202 12 1	23,893 16 11	846,715 10 6
Licenses, rents, and other sources ...	451,859 18 7	192 11 3	887,817 19 6
Government†	460 12 1	212 0 0	156,253 16 9
County	...	...	9,510 4 7
Total revenue	498,523 2 9	24,298 8 2	1,900,297 11 4
Receipts not revenue	221,424 4 6	13,135 4 10	966,087 7 9
Total receipts	719,947 7 3	37,433 13 0	2,866,384 19 1
Expenditure:—			
Public works	337,500 17 6	25,439 6 11	1,667,519 19 4
Charitable aid and hospitals... ...	...	...	85,745 4 10
Management	14,816 1 10	2,671 5 10	483,699 5 5
Other expenditure	322,685 5 4	14,415 6 6	630,541 8 6
Total expenditure	675,002 4 8	42,525 19 3	2,867,505 18 1
Liabilities (including loans)	4,420,961 11 9	229,057 18 5	8,962,727 0 4
Loans†	4,256,481 0 0	220,530 0 0	8,217,196 0 0

* Wellington Harbour Board for nine months to 30th September, 1902; Christchurch Drainage Board for year ended 31st December, 1902; and Dunedin Drainage and Sewerage Board for year ended 31st March, 1903. † See notes to table on previous page.

The expenditure of the local bodies amounted to £2,867,506. In the counties the cost of management, including salaries, travelling-expenses, rent, printing and advertising, collection of rates or tolls, legal expenses, and sundries, was £56,251. The Borough Councils expended in the same way £67,247, and the Road Boards £17,399.

The percentages borne by the cost of management to the total receipts and total expenditure were:—

Cost of Management per Cent. of	Total Receipts.	Total Expenditure.
Counties	9·2	8·9
Boroughs	5·4	5·3
Road Boards	8·6	8·5

HARBOUR BOARDS.

The amount of receipts and expenditure for each of the Harbour Boards in the colony for the year ended 31st December, 1902 (excepting Wellington, the accounts for which were made up for nine months ending 30th September, 1902), also the liabilities at date of balancing, including outstanding loans, have been tabulated in another statement.

Harbour Boards.	Receipts.				Expenditure (excluding Amounts paid to Sinking Fund and for Redemption of Debentures).				
	Revenue from			Receipts not Revenue.	Total Receipts.	Works and Maintenance.	Other Expenditure, Interest, &c.	Out of Loan.	Total Expenditure.	Liabilities (including Outstanding Loans.
	Wharfage Dues, Charges, Fees, Tolls, &c.	Rates, Rents, and other Sources.	Total Revenue.							
	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.
Auckland	48,947 6 1	13,036 13 10	61,983 19 11	77,518 11 6	139,502 11 5	59,606 0 8	32,168 3 8	(a)32,056 13 10	123,830 18 2	483,802 0 0
Bluff	19,665 1 0	2,706 8 10	22,371 9 10	133 15 3	22,505 5 1	10,715 19 4	9,105 5 2	...	19,821 4 6	50,703 9 0
Coromandel ...	44 0 1	...	44 0 1	...	44 0 1	103 18 1	...	...	103 18 1	...
Fortrose	...	20 0 0	20 0 0	...	20 0 0	...	...	...	...	...
Gisborne	9,717 9 5	6,534 10 11	16,252 0 4	6,520 13 11	22,772 14 3	620 7 7	11,169 8 3	a)13,228 9 1	25,018 4 11	201,691 13 4
Greymouth	22,741 14 7	(b)810 12 0	23,552 6 7	5,000 0 0	28,552 6 7	4,736 11 4	17,240 0 4	(a)9,224 19 0	31,201 10 8	222,152 13 8
Half-moon Bay and Horseshoe Bay ...	...	...	...	...	...	...	...	...	...	...
Hokitika	178 17 5	599 15 8	778 13 1	8 16 6	787 9 7	33 13 7	746 11 9	...	780 5 4	12,223 9 10
Lyttelton	40,639 7 2	4,662 2 4	45,301 9 6	5,881 11 0	51,183 0 6	27,013 18 7	25,358 8 10	(a)6,946 13 6	59,319 0 11	264,348 0 6
Mokau	106 16 1	...	106 16 1	...	106 16 1	...	105 13 4	...	105 13 4	...
Napier	21,588 8 8	20,851 12 7	42,440 1 3	(c)914 11 10	43,354 13 1	6,998 5 8	28,252 4 2	(d)3,644 1 0	38,894 10 10	501,581 18 3
Nelson	2,241 1 3	1,104 14 2	3,345 15 5	10,000 0 0	13,345 15 5	...	843 6 4	(a)9,078 1 8	9,921 8 0	10,000 0 0
New Plymouth ...	7,682 11 9	12,438 3 4	20,120 15 1	2,149 4 0	22,269 19 1	6,543 9 0	15,125 17 7	...	21,669 6 7	206,084 2 0
New River ...	795 4 11	148 18 4	944 3 3	...	944 3 3	140 5 2	1,493 4 8	...	1,633 9 10	18,922 0 0
Oamaru	5,717 11 6	8,411 17 6	14,129 9 0	14 10 0	14,143 19 0	2,060 4 6	11,489 0 2	...	13,549 4 8	331,799 0 0
Otago	56,687 12 9	12,796 4 0	69,483 16 9	5,009 3 6	74,493 0 3	25,357 16 0	49,885 5 3	...	75,243 1 3	707,608 14 10
Patea	1,945 7 3	371 12 4	2,316 19 7	45 19 3	2,362 18 10	730 5 9	1,350 19 10	(a)530 11 3	2,611 16 10	14,681 0 9
Riverton	...	247 3 4	247 3 4	...	247 3 4	10 1 11	132 14 6	...	142 16 5	2,000 0 0
Thames	1,565 0 4	179 1 0	1,744 1 4	...	1,744 1 4	1,210 16 10	849 17 5	...	2,060 14 3	10,043 13 0
Timaru	18,971 1 9	7,844 12 8	26,815 14 5	31,772 3 4	58,587 17 9	11,679 19 6	16,437 6 6	(a)25,225 8 3	53,342 14 3	275,184 0 0
Waimakariri ...	...	257 7 0	257 7 0	1 7 0	258 14 0	30 7 1	118 19 11	...	149 7 0	4 6 8
Wairoa	506 4 6	315 2 9	821 7 3	...	821 7 3	1,051 11 4	511 8 6	...	1,562 19 10	5,091 13 1
Waitara	1,509 3 11	(c)750 8 3	2,259 12 2	0 5 0	2,259 17 2	2,122 17 0	366 14 1	...	2,489 11 1	24,156 15 3
Wanganui ...	5,435 15 2	2,521 2 6	7,956 17 8	963 14 9	8,920 12 5	4,737 14 9	4,569 7 9	...	9,307 2 6	60,908 6 9
Wellington(f) ...	74,550 14 11	1,661 6 0	76,212 0 11	35,364 1 10	111,576 2 9	10,281 3 0	53,991 0 9	(g)22,089 10 6	86,361 14 3	355,078 1 8
Westport	58,397 6 5	...	58,397 6 5	40,125 15 10	98,523 2 3	195 4 2	55,063 13 9	(h)40,125 13 10	95,384 11 9	662,716 17 0
Whaingaroa ...	201 2 4	21 5 0	222 7 4	...	222 7 4	29 3 4	83 4 10	...	112 8 2	164 0 0
Whangarei ...	379 6 6	18 2 8	397 9 2	...	397 9 2	276 16 0	107 15 3	...	384 11 3	15 16 2
Totals ...	400,214 5 9	98,308 17 0 *	498,523 2 9	221,424 4 6	719,947 7 3	176,286 10 2	336,565 12 7	162,150 1 11	675,002 4 8	4,420,961 11 9

(a) Public works. (b) Including £250 from Government. (c) Includes £832 13s. 6d. from Government. (d) Public works, £3,431 0s. 10d.; office expenses, £152 10s.; bubonic-plague expenses, £60 10s. 2d. (e) Including £210 12s. 1d. from Government. (f) For nine months to 30th September, 1902. (g) Public works, £22,047 0s. 6d.; other expenditure, £42 10s. (h) Public works, £39,445 9s. 5d.; office expenses, £680 4s. 5d.

* Including *Rates*: Gisborne, £5,671 9s. 9d.; Napier, £19,087 18s. 3d.; New Plymouth, £8,091 19s. 9d.; Oamaru, £6,045 12s. 6d.; Timaru, £7,006 15s. 5d.; Wairoa, £298 16s. 5d.: total, £46,202 12s. 1d.

Loans of Local Bodies.

In a table on page 377 will be found a summary of the amounts raised by loan, classified according to the rates of interest paid, distinguishing loans raised in the colony from those raised abroad. It will be noticed that the amount raised abroad (£5,336,600) is nearly twice as great as that raised in New Zealand (£2,880,596). The lowest rate of interest paid was 3 per cent., but the large sum of £2,812,872 was raised at 5 per cent., and £2,339,420 at 6 per cent., while £110,900 bore interest as high as 7 per cent.

Loans of Local Bodies, March, 1903.—Net Indebtedness and Annual Charge.

	Amount of Debentures and Stock in Circulation.	Amount of Accrued Sinking Fund.	Net Indebtedness.	Annual Charge (excluding Exchange and Commission).		
				Interest.	Sinking Fund.	Total.
	£	£	£	£	£	£
Counties	6,614	953	5,661	549	106	655
Boroughs	3,655,436	404,961	3,250,475	184,932	14,137	199,069
Town Boards	500	121	379	30	15	45
Road Boards	17,915	..	17,915	762	29	791
River Boards	38,470	6,861	31,609	1,948	564	2,512
Water-supply Board	21,200	1,412	19,788	1,015	250	1,265
Harbour Boards	4,256,481	422,753	3,833,728	206,885	21,979	228,864
Drainage Boards	220,580	41,459	179,121	13,117	2,125	15,242
Totals	8,217,196	878,520	7,338,676	409,238	39,205	448,443
Inscribed debt of local bodies under "The Government Loans to Local Bodies Act, 1886," and "The Local Bodies' Loans Act, 1901," and Amendment Act, 1902, (including inscribed stock exchanged for debentures under "The Roads and Bridges Construction Act, 1882")	1,266,002	..	1,266,002*	..	..	68,227
Totals	9,483,198	878,520	8,604,678	409,238	39,205	516,670

* Repayable by annual instalments of £68,227, representing 4½ per cent. per annum on £ 64,361, 4 per cent. per annum on £30,430, and 3 per cent. per annum on £ 74,689, the amounts inscribed to 1st February, 1903. Repayments on the amount inscribed (£1,669,480, including £89,878 debentures under "The Roads and Bridges Construction Act, 882," exchanged) would be £2,063,431. The actual repayments to date are £524,522, leaving £1,538,909 to be paid by way of interest and sinking fund on a present indebtedness of £1,266,002.

Loans of Local Bodies, raised within and without the Colony.

Table showing the Amount of Indebtedness of Counties, Boroughs, Town, Road, River, and Water-supply Boards, as on the 31st March, 1903, and of Harbour and Drainage Boards as on the 31st December, 1902, classified according to the Rates of Interest paid, distinguishing Loans raised in the Colony from those raised elsewhere. (See note.)

Loans raised in the Colony.

Local Bodies.	No Interest.	3 %	3¾ %	4 %	4¼ %	4½ %	5 %	5¼ %	5½ %	6 %	6½ %	7 %	Total.
	£	£	£	£	£	£	£	£	£	£	£	£	£
Counties	..	..	..	..	..	2,414	4,200	..	..	..	..	..	6,614
Boroughs	25,000	..	..	745,314	76,500	239,580*	467,322	18,000	50,900†	112,620	2,600	50,900	1,788,736
Town Boards ..	..	..	..	..	..	..	..	..	..	500	..	..	500
Road Boards ..	..	..	200‡	10,265	..	5,750	1,700	..	..	..	..	..	17,915
River Boards ..	..	..	..	3,200	..	5,000	650	..	3,120	5,500	..	..	17,470
Water supply Board ..	..	..	..	..	..	9,000	12,200	..	..	..	..	..	21,200
Harbour Boards ..	..	14,031	60,000	828,200	..	33,700	58,650	..	31,000	..	..	..	1,025,581
Drainage Boards ..	..	..	..	..	..	2,530	50	..	..	..	..	..	2,580
Total raised in colony	25,000	14,031	60,200‡	1,586,979	76,500	297,974*	544,772	18,000	85,020†	118,620	2,600	50,900	2,880,596

Loans raised outside the Colony.

Boroughs	..	..	..	33,000	..	254,700	486,300	..	..	1,032,700	..	60,000	1,866,700
River Boards ..	..	..	..	..	..	..	21,000	..	..	..	..	..	21,000
Harbour Boards ..	..	..	..	400,000	..	100,000	1,760,800	..	..	970,100	..	..	3,230,900
Drainage Board ..	..	..	..	..	..	..	..	..	..	218,000	..	..	218,000
Total raised out of colony	..	..	..	433,000	..	354,700	2,268,100	..	..	2,220,800	..	60,000	5,336,600

Total Loans raised.

Counties	..	..	..	..	..	2,414	4,200	..	..	..	..	..	6,614
Boroughs	25,000	..	..	778,314	76,500	494,280*	953,622	18,000	50,900†	1,145,320	2,600	110,900	3,655,436
Town Boards ..	..	..	..	..	..	..	..	..	..	500	..	..	500
Road Boards ..	..	..	200‡	10,265	..	5,750	1,700	..	..	..	..	..	17,915
River Boards ..	..	..	..	3,200	..	5,000	21,650	..	3,120	5,500	..	..	38,470
Water-supply Board ..	..	..	..	..	..	9,000	12,200	..	..	..	..	..	21,200
Harbour Boards ..	..	14,031	60,000	1,228,200	..	133,700	1,819,450	..	31,000	970,100	..	..	4,256,481
Drainage Boards ..	..	..	..	..	..	2,530	50	..	..	218,000	..	..	220,580
Total loans raised ..	25,000	14,031	60,200‡	2,019,979	76,500	652,674*	2,812,872	18,000	85,020†	2,339,420	2,600	110,900	8,217,196

* Including £2,500 at 4¾ per cent. † Including £2,000 at 5 7/10 per cent. and £3,000 at 5¾ per cent. ‡ 3½ per cent.

Note.—Not including loans, amounting to £1,266,002, repayable by annual instalments under "The Roads and Bridges Construction Act, 1882," "The Government Loans to Local Bodies Act, 1886," and "The Local Bodies' Loans Act, 1901," and Amendment Act, 1902.

From the tables on the preceding pages it will be seen that the total amount owing was, on the 31st March, 1903, £8,217,196. But against this accrued sinking funds to the value of £878,520 were held, leaving a net debt of £7,338,676, exclusive of moneys borrowed from the General Government and repaid by annual instalments.

The total annual charge (excluding exchange and commission) stood at £448,443, of which £409,238 was for interest, and the remainder, £39,205, contributions to sinking fund accounts.

Of the total net indebtedness in 1902–1903 the debt of the Harbour Boards, £3,833,728, formed the largest item, while the Borough Councils owed £3,250,475.

On referring to the comparative table on page 370, a great advance in the outstanding loans of local governing bodies will be noticed. Between 1893 and 1903 the gross indebtedness increased from £6,203,869 to £8,217,196, an addition of £2,013,327 or over 32 per cent. during the ten years. During the same period the population advanced at the rate of 24 per cent., and the value of land and improvements (1891–1903) from £122,000,000 to £168,800,000, or at the rate of 38 per cent.

The aggregate interest-charge for the year under review was £409,238, and £284,134 of this was payable on loans raised outside the colony. The average rate of interest payable to bondholders was £4 19s. 11d. per cent.

While the average rate of interest on the above-mentioned debt is found to be slightly less than 5 per cent., over two millions and three-quarters were raised at 5 per cent., and nearly two and a half millions at 6 per cent. or over.

The Local Bodies' Loans Acts, 1901, 1902, and 1903.

The Act of 1901 consolidates all former measures dealing with the borrowing-powers of local bodies. It does not affect the securities issued for any loan raised under any Act repealed.

As to Government loans to local bodies, the yearly rate of interest and the period during which interest is payable by the local authority have now been altered by the Amendment Act of 1903, and stand as under :—

At the option of the authority concerned—

(*a.*) Five per centum per annum for a period of twenty-six years ; or

(*b*.) Four and a half per centum per annum for a period of thirty-two years; or

(*c*.) Four per centum per annum for a period of forty-one years.

The Amendment Act of 1902 empowers the Colonial Treasurer to lend to small boroughs, having at the time of the last preceding census a population of less than two thousand persons, any sum not exceeding £2,000 in any year for the purpose of making streets within the borough.

The interest payable in respect of every existing loan the period of which is twenty-six years shall be 4½ per centum per annum. There are provisions for readjustment of the rate of interest on loans for twenty-six years existing at the time of the passing of the Act of 1903, which are regulated by the length of the period over which the repayment of the loan is extended.

At the expiration of the period during which interest is payable the liability of the local authority shall cease without further payment.

Municipal Franchise.

"The Municipal Corporations Act, 1900," with its amending Act of 1902, deals with the franchise in the case of boroughs, and provides that, in addition to the persons who are already entitled to be enrolled, every person shall be so entitled who possesses the freehold or residential qualifications stated in the Act.

The possession of the freehold qualification is defined as being the beneficial and duly registered owner of a freehold estate in land of the capital value of not less than £25, situated in the borough, notwithstanding that any other person is the occupier thereof, or part thereof, under any tenancy.

Every person is deemed to possess a residential qualification within a borough if he is, and for at least three months last past has been, a residential occupant within such borough.

No person may be entered in the burgess lists in respect of more qualifications than one; but any person who has more than one qualification may select the one in respect of which he wishes to be entered.

In the case of husband and wife, any qualification possessed by one of them is deemed to be possessed by each.

No person enrolled on a burgess roll has more than one vote, and no person enrolled by virtue of the residential qualification can vote on any proposal relating to loans or rates.

Increased Rating-powers of Counties, Road and Town Districts.

By "The Counties Act Amendment Act, 1903," section 4, it is provided that, notwithstanding anything in the principal Act, the maximum general rate that may be made and levied shall be—

(*a.*) In counties where there are no road or town districts, a rate of threepence in the pound on the capital value of the rateable property therein, or its equivalent on the unimproved value or annual value; and

(*b.*) In counties where there are road or town districts,—

(i.) In outlying districts, a rate of threepence in the pound on the capital value, or its equivalent as aforesaid;

(ii.) In all other parts of the county, a rate of three-halfpence in the pound on the capital value, or its equivalent as aforesaid.

And under section 5 the County Council may make and levy rates, called "separate rates," in addition to or in lieu of any general rate, upon all rateable property in any riding of a county; or may by special order make or levy any such rate upon all rateable property within the portion of the county defined in the order. But the total amount of separate rates and general rates together is not to exceed in any one year the amount of the maximum general rate prescribed by the last preceding section (No. 4, quoted above).

By "The Road and Town Districts Rating Act, 1903," the rating-powers of the Boards are extended. Under section 2 the maximum general rate that may be made and levied in any year in a road or town district is a rate of three-halfpence in the pound on the capital value of the rateable property of the district, or its equivalent on the unimproved value, or two shillings in the pound on the annual value, as the case may be. Under section 3, where road districts are divided into subdivisions, no separate rates made and levied in any year may, with the general rates, exceed in any subdivision the amount of the maximum general rate aforesaid.

Rating on Unimproved Value.

A special article on this system of rating (which it is optional with local governing bodies to adopt or not) is given in Part III. of this work.

Up to the end of March, 1904, sixty-four local governing bodies (thirty-three boroughs, thirteen counties, one town district, and eight road districts) had notified in the *New Zealand Gazette* that the proposal to levy rates on the unimproved value of land had been carried, while in nine cases (eight boroughs and one county) the proposal had been rejected.

TABLE SHOWING THE RESULT OF POLLS TAKEN UNDER "THE RATING ON UNIMPROVED VALUE ACT, 1896," AND AMENDMENT ACT OF 1900, TO 31ST MARCH, 1904.

	Date of Poll.	Result of Poll.	Votes recorded.		
			For.	Against.	Informal.
Ashburton Borough	14 Jan., 1903	Rejected ..	102	199	4
Auckland City	7 Aug., 1901	" ..	753	1,697	..
Balclutha Borough	7 July, 1902	Carried ..	60	33	..
Blenheim Borough	17 June, 1903	" ..	224	64	..
Cheviot County	6 Oct., 1898	" ..	165	41	..
Christchurch City	30 June, 1902	" ..	596	512	..
Devonport Borough	30 Oct., 1900	" ..	356	109	..
Eketahuna County	1 Feb., 1900	" ..	149	21	1
Feilding Borough	16 April, 1901	" ..	268	56	1
Foxton Borough	20 June, 1902	Rejected ..	53	98	4
Gore Borough	7 July, 1901	Carried ..	122	67	5
Grey Lynn Borough	20 Mar., 1901	" ..	140	71	2
Greymouth Borough.. ..	23 Feb., 1898	" ..	214	48	1
Hamilton Borough	13 Feb., 1901	" ..	77	52	..
Hastings Borough	14 July, 1902	Rejected ..	250	265	15
Hawera Borough	8 April, 1903	Carried ..	129	9	1
Hokianga County	11 Mar., 1899	" ..	109	25	6
Hokitika Borough	5 May, 1901	" ..	212	53	1
Hunua Road District ..	5 April, 1899	" ..	60	2	..
Inangahua County	14 May, 1898	" ..	284	11	2
Invercargill Borough.. ..	5 June, 1901	" ..	386	174	4
Karori Borough	4 April, 1898	" ..	93	3	1
Linwood Borough[a]	30 May, 1901	" ..	276	38	2
Lower Hutt Borough ..	12 Oct., 1901	" ..	94	68	4
Manawatu Road District[b] ..	6 Jan., 1900	" ..	105	10	..
Maori Hill Borough	25 Jan., 1904	" ..	119	27	..
Maraetai Road District ..	2 June, 1900	" ..	16	..	..
Mareretu Road District[c] ..	28 June, 1902	" ..	24	..	..
Masterton Borough	29 Aug., 1901	" ..	221	139	6
Melrose Borough[d]	3 Mar., 1898	" ..	236	40	6
Mosgiel Borough	27 Feb., 1902	Rejected ..	53	87	1
Normanby Town District[e] ..	15 Nov., 1897	Carried ..	82	56	3
North Invercargill Borough ..	1 April, 1903	" ..	107	24	2
Onslow Borough	20 Mar., 1901	" ..	140	8	..
Pahiatua Borough	19 June, 1897	" ..	136	38	1
Pahiatua County	27 June, 1901	" ..	350	31	3
Palmerston North Borough ..	5 Mar., 1897	" ..	402	12	3
Papakura Road District ..	10 Mar., 1900	" ..	30	1	..
Pelorus Road District ..	31 Mar., 1900	" ..	98	41	..
Petone Borough	6 Nov., 1901	Rejected*	100	134	4
Picton Borough	..	Rejected ..	27	73	1
"	30 July, 1903	Carried ..	47	38	9
Raglan County	23 Nov., 1901	Carried* ..	116	85	2

(a) Now part of Christchurch City. (b) Road district not now in existence. (c) Illegal, not in accordance with section 5, "Rating Act, 1894." (d) Now part of Wellington City. (e) Proposal to rescind the adoption of the Act rejected. For proposal, 23; against, 38; informal, 3. * New poll taken under Act of 1900.

TABLE SHOWING THE RESULT OF POLLS TAKEN UNDER "THE RATING ON UNIMPROVED VALUE ACT, 1896," AND AMENDMENT ACT OF 1900, TO 31ST MARCH, 1904—*continued.*

——	Date of Poll.	Result of Poll.	Votes recorded.		
			For.	Against.	Informal.
St. Albans Borough	13 Feb., 1902	Carried ..	350	218	15
South Invercargill Borough ..	2 Feb., 1902	" ..	106	54	1
Southland County	1 Mar., 1902	" ..	919	574	..
Spreydon Road District ..	16 May, 1901	" ..	141	57	4
Stratford County	29 June, 1901	" ..	399	23	2
Stratford Borough	23 July, 1902	" ..	137	64	1
Sumner Borough	21 Nov., 1901	Carried* ..	91	19	..
Sydenham Borough[a] ..	14 Mar., 1901	Carried ..	353	193	..
Taratahi-Carterton Road District[b]	26 Aug., 1897	" ..	261	53	..
Tauranga County	9 Feb., 1901	" ..	90	13	2
Timaru Borough	10 Oct., 1900	Rejected ..	93	246	5
Waimarino County	23 Sept., 1903	Carried ..	43	13	..
Waimate Borough	2 Feb., 1901	" ..	235	61	14
Waimate County	1 Nov., 1900	" ..	368	162	..
Waipawa County[c]	2 Feb., 1898	" ..	462	28	3
Wairarapa North County[d] ..	8 Nov., 1899	Rejected[d]	331	68	10
Wairarapa South County ..	23 Oct., 1902	Carried ..	187	8	..
Wanganui Borough	17 Dec., 1903	Rejected ..	303	331	2
Wellington City	11 Nov., 1901	Carried ..	1,261	591	..
Winton Borough	29 Nov., 1901	" ..	39	31	1
Woodville Borough	21 Mar., 1898	" ..	175	7	1
Woolston Borough	24 June, 1902	Carried* ..	252	190	7

[a] Now part of Christchurch City. [b] Road district not now in existence. [c] Including Woodville County since constituted. [d] Poll taken prior to coming into operation of section 2 of "The Local Government Voting Reform Act, 1899"; less than one-third of ratepayers voted, and proposal consequently rejected. The county has since been subdivided and absorbed in other counties. * New poll taken under Act of 1900.

A county having decided to levy rates on the unimproved value, makes it compulsory for all interior Town and Road Boards to adopt the same system of rating. But in counties where the Counties Act is suspended, or where a general rate is not levied, the ratepayers of any Road Board may take a poll on the question. It is also permissible for any Town Board within a county not rating on the unimproved value to adopt that system, the decision to do so having been carried by vote of the ratepayers. The date of the polling did not, in some instances, allow of a rate on the unimproved value being struck for the year ended 31st March, 1903.

The amount of rates levied by the various Borough Councils, County Councils, Town Boards, and Road Boards, with other particulars, as returned by these bodies for the 31st March, 1903, will be found on the following pages:—

Boroughs, 1902–1903.

Name of Borough.	Estimated Area (including Town Belt) in Acres.	Population.	Number of			Amount of Rate levied in the Pound.					Estimated Annual (orrenting) Value of Rateable Property, March, 1903.	Capital Value of Rateable Property, March, 1903.	Unimproved Value of Rateable Property, March, 1903.
			Dwellings.	Ratepayers.	Rateable Properties.	General.	Separate.	Special.	Water.	Library.			
						s. d.	s. d.	s. d.	s. d.	s. d.	£	£	£
Whangarei ..	2,038	2,000	395	370	480	0 $1\frac{1}{2}$	..	..	..	..	..	142,231	..
Birkenhead ..	2,700	1,100	270	264	291	1 3	0 $2\frac{1}{4}$	0 $2\frac{1}{2}$	..	..	7,768	..	..
Devonport ..	640	5,000	838	696	1,245	0 $1\frac{1}{2}$	$\frac{5}{8}$d., $\frac{3}{16}$d.	$\frac{1}{2}$d., $\frac{3}{4}$d., & 1d.	(1)6d., or $2\frac{1}{2}$ per cent.	..	..	..	238,157
Auckland ..	1,762	37,022	7,180	5,459	8,641	0 9	(2)0 2	1 3	(3)$\frac{1}{4}$ to $2\frac{1}{2}$ per cent.	..	358,864	..	..
Grey Lynn ..	900	5,200	1,050	940	*	0 $1\frac{3}{4}$	(4)0 $0\frac{1}{4}$	0 $0\frac{3}{4}$	(5)4, $4\frac{1}{2}$, $5\frac{1}{2}$, 6 per cent.	..	..	..	197,000
Newmarket ..	150	2,060	420	314	400	1 7	..	0 5	4 to 5 per cent.	..	14,695	..	..
Parnell ..	480	4,850	970	623	909	1 5	..	0 10	4 per cent.	..	32,600	..	..
Onehunga ..	1,200	3,015	840	609	1,010	1 0	..	..	4 per cent.	0 $0\frac{1}{2}$	18,753	..	..
Thames ..	2,560	4,209	*	*	*	1 2	0 4	..	(6)	0 1	..	..	..
Te Aroha ..	200	890	203	208	323	1 3	..	..	0 7	..	6,500	..	..
Waihi ..	3,130	4,000	1,000	1,400	1,475	0 $0\frac{5}{8}$	..	..	..	..	..	160,872	..
Hamilton ..	1,600	1,300	450	400	660	0 3	..	..	..	..	..	..	62,000
Cambridge ..	1,083	1,000	267	210	688	1 0	..	..	1 0	..	6,725	..	..
Tauranga ..	1,000	1,025	390	413	590	1 0	..	1 3	..	..	5,000	..	..
Gisborne ..	1,260	2,800	575	530	800	1 9	..	0 3	..	..	38,300	..	..
New Plymouth	850	4,500	960	800	1,200	1 9	..	0 10	0 6	..	46,224	..	..
Stratford ..	1,920	2,100	460	600	1,020	0 $1\frac{1}{2}$	..	$\frac{1}{8}$d., $\frac{1}{4}$d., & $\frac{3}{4}$d.	(1)0 6	..	..	244,000	..
Hawera ..	500	2,500	500	450	620	1 3	..	..	7 per cent.	..	18,945	..	..
Eltham ..	1,590	1,400	300	272	386	(7)0 $1\frac{1}{2}$	..	..	..	..	..	106,983	..
Patea ..	1,420	700	280	199	380	1 3	0 $4\frac{3}{8}$	..	0 $1\frac{3}{4}$	..	6,383	..	..
Wanganui ..	1,000	7,386	1,600	1,568	1,850	0 10	..	1 0	..	..	65,000	..	..
Marton (1902)	1,423	1,101	238	249	406	1 0	..	1 6	..	0 $0\frac{1}{2}$	9,953	..	..
Feilding ..	3,500	2,500	500	470	890	0 2	..	0 $1\frac{3}{5}$	..	0 $0\frac{1}{8}$	..	..	136,973
Palmerston N.	4,593	7,828	1,628	1,300	2,910	0 $2\frac{1}{2}$	..	$\frac{1}{16}$d., $\frac{1}{10}$d., $2\frac{1}{2}$d.	2 per cent. under max.	0 $0\frac{1}{8}$	..	..	331,614

Boroughs, 1902–1903—*continued.*

Name of Borough.	Estimated Area (including Town Belt), in Acres.	Population.	Number of			Amount of Rate Levied in the Pound.					Estimated Annual (or rentine) Value of Rateable Property in March, 1903.	Capital Value of Rateable Property, March, 1903.	Unimproved Value of Rateable Property, March, 1903.
			Dwellings.	Ratepayers.	Rateable Properties.	General.	Separate.	Special.	Water.	Library.			
						s. d.	s. d.	s. d.	s. d.	s. d.	£	£	£
Foxton ..	5,760	1,250	296	320	658	1 3	..	0 $1\frac{1}{4}$	..	0 1	8,737	..	..
Hastings ..	5,740	3,800	840	862	1,312	1 2	..	0 10	..	0 1	42,340	..	..
Napier ..	879	9,015	1,879	984	2,600	0 9	..	5d. & 10d	1 to 3 per cent.	..	86,412	..	..
Dannevirke ..	1,222	3,000	500	502	1,513	1 3	..	2d. & 5d.	$2\frac{1}{2}$ & $3\frac{3}{4}$ per cent.	0 1	21,796	..	..
Woodville ..	1,240	996	232	477	477	0 $3\frac{5}{8}$	..	..	$2\frac{1}{2}$, 3, $3\frac{1}{2}$ per cent.	..	..	..	41,031
Pahiatua ..	740	1,260	365	410	460	0 3	..	0 $1\frac{1}{2}$	..	..	..	..	69,265
Masterton ..	4,311	4,000	700	750	1,078	0 2	..	0 $0\frac{3}{4}$	(8)	0 $0\frac{1}{8}$	..	..	315,266
Carterton ..	1,880	1,205	287	262	378	0 $1\frac{15}{16}$	..	0 $1\frac{367}{388}$	.. [sec. 3d	..	..	110,425	..
Greytown ..	3,907	1,122	252	235	376	1 6	..	0 2	No. 1 sec. 6d, No. 2	0 1	9,312	..	..
Lower Hutt ..	3,225	2,230	438	412	571	0 2	..	..	..	..	..	..	225,870
Petone ..	952	4,750	942	680	1,560	1 0	..	1 1	..	..	34,300	..	..
Onslow ..	2,870	1,500	332	360	650	0 2	0 $0\frac{1}{8}$	0 $0\frac{3}{4}$	..	..	..	..	150,589
Wellington ..	1,100	45,419	8,243	5,789	9,958	0 $1\frac{3}{4}$	(1)0 3	$\frac{7}{16}$d., $\frac{35}{64}$d., $\frac{21}{256}$d., $\frac{7}{64}$d.	(1)4 per cent.	0 $0\frac{7}{64}$	..	..	5,855,629
Karori ..	5,127	1,250	310	320	549	0 $1\frac{3}{4}$	(2)0 $0\frac{3}{16}$	0 $1\frac{1}{8}$	..	..	..	..	151,625
Melrose ..	3,962	4,295	859	1,040	1,483	0 $1\frac{3}{4}$	0 $0\frac{1}{4}$	0 $0\frac{1}{6}$	..	..	..	..	324,719
Picton ..	560	870	165	295	980	0 $1\frac{1}{2}$	(2)0 $0\frac{1}{5}$	..	$\frac{1}{4}$d. and $\frac{1}{2}$d.	..	..	90,437	..
Blenheim ..	1,571	3,250	755	559	1,450	1 $1\frac{1}{4}$	(2)0 $2\frac{1}{4}$	0 $2\frac{1}{2}$	..	..	24,894	..	..
Nelson ..	4,800	7,513	1,521	1,180	2,375	1 3	..	0 $3\frac{7}{8}$	2 to $3\frac{1}{2}$ per cent.	..	59,483	..	..
Richmond ..	2,300	590	132	134	154	0 $0\frac{3}{4}$	..	..	(1)4 per cent.	..	..	86,324	..
Motueka ..	5,643	897	168	179	377	0 1	..	..	..	..	..	92,346	..
Westport ..	713	3,200	839	1,026	1,202	2 0	..	..	$3\frac{1}{2}$ and 5 per cent.	..	22,500	..	..
Greymouth ..	2,000	4,300	832	677	1,103	0 4	..	(9)0 $0\frac{1}{2}$	..	..	..	..	86,008
Brunner ..	5,700	1,570	340	272	320	1 6	7d., 10d.	(2)0 8	..	..	3,900	..	..
Kumara ..	842	1,130	237	317	439	0 $1\frac{1}{2}$	0 $1\frac{1}{2}$	..	..	..	..	27,551	..
Hokitika ..	1,280	2,000	630	570	670	0 4	0 $1\frac{7}{8}$	0 $1\frac{7}{8}$	..	..	..	..	48,245
Ross ..	4,196	650	300	350	414	$\frac{3}{4}$d. & $1\frac{1}{2}$ l.	0 $0\frac{1}{2}$	..	..	..	..	33,675	..
Rangiora ..	1,040	1,768	405	343	552	0 $0\frac{3}{4}$	..	..	..	..	..	170,296	..
Kaiapoi ..	1,020	1,780	420	360	630	1 3	..	..	..	..	10,362	..	..

Christchurch	1,249	19,079	3,837	3,120	4,896	1	7	[10]	2½d., 1¾d.	..	..	247,049	..	..
Linwood ..	659	7,333	1,542	1,399	1,561	0	4½	[11]	[12]	..	..	..	..	169,286
St. Albans ..	1,500	6,700	1,520	1,420	1,859	0	3	[13]	0 0⅞	..	..	..	..	285,763
Sydenham ..	1,190	12,679	2,572	2,037	2,469	0	3¼	[14]	0 0 51/64	..	..	..	..	249,049
Woolston ..	1,276	2,800	578	529	706	0	1¼	[2]0 0 5/32	[15]	..	..	..	209,064	..
Sumner ..	4,876	864	233	297	418	0	1⅝	[2]0 0⅛	0 0¾	0 0 5/16	..	..	..	62,655
New Brighton	1,500	1,100	226	..	..	1	4	0 2	0 7	..	..	7,014	..	..
Lyttelton ..	2,014	4,026	846	611	803	1	3	..	..	..	..	26,068	..	..
Akaroa ..	221	596	136	130	190	0	0 15/16	..	..	..	..	..	48,182	..
Ashburton ..	680	2,400	540	544	..	2	0	..	..	..	..	23,155	..	..
Temuka ..	794	1,550	353	389	658	0	1½	[16]0 0⅜	[17]0 0¾	..	..	..	92,954	..
Timaru ..	1,100	7,000	1,227	1,124	1,719	1	3	..	1 0	2½ to 5 per cent.	..	54,350	..	..
Waimate ..	649	1,400	350	360	500	0	4	..	..	..	..	..	..	45,320
Oamaru ..	1,111	5,000	1,295	923	1,510	2	0	..	1 3	[18]	..	30,855	..	..
Hampden ..	640	310	90	118	120	0	0¾	..	..	..	..	..	18,000	..
Palmerston S.	800	750	190	248	360	0	1	..	..	..	..	..	43,538	..
Hawksbury ..	2,700	690	168	240	440	0	0¾	..	..	..	..	..	46,492	..
Port Chalmers	335	2,056	500	520	581	1	3	..	..	[19]	..	12,350	..	..
North-East Valley	5,980	3,925	785	1,200	1,250	1	2	..	0 6	..	..	19,845	..	..
Maori Hill ..	3,700	1,600	345	382	399	1s., 1s. 3d., & 1s. 6d.		..	..	[20]	..	11,602	..	..
West Harbour	1,670	1,490	304	480	639	1	0	..	1 0	..	..	9,111	..	..
Dunedin ..	1,800	25,214	4,983	3,200	6,021	1	3	..	0 9	[21]	..	268,965	..	..
Roslyn ..	2,000	5,000	1,035	1,059	1,172	1	6	0 1½	[22]	..	..	34,697	..	..
Mornington ..	654	4,095	850	844	997	1	6	..	..	..	..	23,606	..	..
Caversham ..	1,073	5,500	1,073	880	1,083	1	4	0 3	0 3	5 per cent.	..	33,932	..	..
St. Kilda ..	463	1,900	415	497	688	1	0	0 6	0 6	5s. to 5 per cent.	..	12,198	..	..
South Dunedin	413	6,509	1,132	962	1,218	1	0	0 6	0 6	6 per cent.	..	25,582	..	..
Green Island	103	680	138	150	186	1	3	..	..	..	..	2,968	..	..
Mosgiel ..	967	1,500	320	330	539	1	3	..	..	..	..	9,254	..	..
Milton ..	265	1,400	275	215	330	1	6	..	..	..	..	7,136	..	..
Kaitangata ..	1,158	2,000	350	286	545	1	3	0 6	..	..	..	7,230	..	..
Balclutha ..	568	1,040	270	260	320	1	0	..	..	..	0 1	5,394	..	..
Lawrence ..	640	1,170	245	360	310	1	0	..	..	3d. and 6d.	..	8,153	..	..
Roxburgh ..	400	500	122	81	125	1	0	..	..	6d., min. chge. 6s.	..	1,767	..	..
Tapanui ..	126	500	140	80	146	1	9	..	..	..	..	2,074	..	..
Naseby ..	113	550	166	150	163	1	0	..	..	2½, 3½, 6, and 7 per cent.	..	2,412	..	..

Boroughs, 1902–1903.

Name of Borough.	Estimated Area (including Town Belt) in Acres.	Population.	Number of			Amount of Rate Levied in the Pound.					Estimated Annual (or reuting) Value of Rateable Property in March, 1903.	Capital Value of Rateable Property, March, 1903.	Unimproved Value of Rateable Property, March, 1903.
			Dwellings.	Ratepayers.	Rateable Properties.	General.	Separate.	Special.	Water.	Library.			
						s. d.	s. d.	s. d.	s. d.	s. d.	£	£	£
Cromwell ..	640	700	160	150	225	1 3	..	..	1 2	..	5,061	..	..
Alexandra ..	840	1,000	220	307	330	1 0	0 6	1 0	6d. sanitary rate.	..	8,000	..	..
Arrowtown ..	390	400	105	96	210	1 6	..	..	..	..	1,908	..	..
Queenstown ..	923	690	196	175	714	1 0	..	0 6	0 6	..	4,850	..	..
Gore ..	1,150	2,600	560	620	1,350	0 $2\frac{1}{5}$	(4)0 $0\frac{2}{5}$	0 $0\frac{13}{16}$	..	..	..	..	99,586
Mataura ..	1,530	975	245	218	450	1 6	..	..	..	..	6,005	..	..
Winton ..	160	500	100	120	160	0 $2\frac{1}{2}$	..	..	..	..	..	..	17,803
Invercargill ..	1,040	6,500	1,285	1,100	1,800	0 $2\frac{1}{16}$	(23)0 3	$\frac{5}{16}$d. .. $1\frac{7}{8}$d.	(18)	..	..	..	434,766
North Invercargill	326	925	208	287	368	1 4	..	1 4	..	..	4,084	..	..
South Invercargill	4,000	1,950	384	619	907	0 $3\frac{1}{2}$	..	0 $2\frac{1}{2}$	..	..	..	..	44,685
East Invercargill	121	939	200	197	245	1 9	..	0 9	..	..	4,331	..	..
Avenal ..	80	355	80	107	120	1 0	..	..	..	..	2,393	..	..
Gladstone ..	240	380	70	140	150	1 0	..	0 6	..	..	3,941	..	..
Campbelltown	2,000	1,500	360	360	660	1 3	..	..	..	..	10,074	..	..
Riverton ..	718	850	253	230	423	1 3	..	..	..	..	4,254	..	..

(1) On annual value. (2) Hospital and charitable aid. (3) Minimum, 10s. per annum. (4) On capital value. (5) On annual value. (6) 10s. per annum on property valued at less than £20; over £20, $2\frac{1}{2}$ per cent.; half-rate where supply not used. (7) For eighteen months. (8) Consumption rate, 5 per cent., $2\frac{1}{2}$ per cent., and $1\frac{1}{4}$ per cent. (9) On capital value, for charitable-aid purposes. (10) $1\frac{1}{2}$d. hospital and charitable aid; 3d. separate, on part of one ward only. (11) South Waimakariri River Board, $\frac{3}{32}$d. on capital value; hospital and charitable aid, $\frac{1}{10}$d. on capital value; Drainage Board rate—sewage area, $\frac{3}{4}$d. on capital value; rural area, $1\frac{3}{8}$d. on unimproved value; sanitation fee, 8s. 6d. per pan. (12) Tuam Street drain rate, $\frac{1}{2}$d. on capital value (drain area only); recreation-ground rate, $\frac{1}{7}$d. on unimproved value; public-works loan rate, $\frac{1}{2}$d. on unimproved value. (13) $\frac{3}{64}$d. on unimproved value; $\frac{1}{8}$d. on capital value. (14) Drainage rate—sewage area, $\frac{3}{4}$d. on capital value; rural area, $\frac{3}{8}$d. on unimproved value; Waimakariri River Board, $\frac{1}{10}$d. on unimproved value. (15) Christchurch drainage, $\frac{1}{4}$d.; Waimakariri rate, $\frac{2}{63}$d. (16) West district only. (17) Drainage district only. (18) Maximum under "Municipal Corporations Act, 1900." (19) In terms of section 102, "Municipal Corporations Act, 1900." (20) Sanitation fee, 15s. per house. (21) Under £12 10s., 10s.; under £300, 5 per cent.; over £300, 4 per cent.; shops, warehouses, &c., half-rates. (22) Sanitation rate, 3d. in part of district. (23) On annual value, for hospital and charitable aid.

* No information.

Counties, 1902–1903.

[Note.—For value of land and improvements see Section XXI.]

Counties.	Area in Square Miles (including Boroughs).	Population, Census, March, 1901, (excluding Boroughs).	Rates struck by County on Capital Rateable Value.		On Unimproved Value.	
			General.	Other.	General.	Other.
Mongonui ..	934	2,274	*	*	*	*
Whangaroa ..	160	927	1d.			
Hokianga ..	972	1,767	..	..	2½d.	$\frac{5}{16}$d. charitable purposes.
Bay of Islands ..	826	2,587	1d.			
Hobson ..	688	4,813	1½d.	Special, Lucks, ¾d.; Kopuru Swamp, drainage, ¾d.; Curnow's deviation, 1½d.; H. and C. A., ⅛d.		
Whangarei ..	928	6,380	¾d.	¾d. separate.		
Otamatea ..	364	2,721	¾d.	¾d. separate in two outlying districts, and ½d. in two.		
Rodney ..	566	3,678	¾d.	¼d. C.A.; ¼d. separate in Hoteo outlying district.		
Waitemata ..	613	7,035	¾d.	¾d. separate, Mairetahi, Wainui, Kaukapakapa outlying districts; ¾d. Birkenhead and Waikumete Ridings; ½d. Northcote, Takapuna, Waitekerei Ridings; $\frac{5}{16}$d. special, Mairetahi Riding.		
Eden	43	19,314				
Manukau ..	791	12,306				
Coromandel ..	403	4,169	1½d.	1½d. special for special district, Coromandel water-supply.		
Thames ..	494	5,043	1½d.	6d. per acre, Matakohe Drainage District, 1,554 acres.		
Ohinemuri ..	478	9,978	⅝d.	¾d. special, Paeroa Water-rating District.		
Piako	1,095	2,436	¾d.	¼d. separate, Te Aroha, Patetere, and Taotaoroa Ridings.		
Waikato ..	591	3,183	¼d.			
Waipa ..	282	3,580	½d., ¾d.	¾d. separate, Hamilton, Mangapiko, and Alexandra outlying districts.		

COUNTIES, 1902–1903—*continued*.

Counties.	Area in Square Miles (including Boroughs).	Population, Census, March, 1901 (excluding Boroughs).	Rates struck by County on Capital Rateable Value.		On Unimproved Value.	
			General.	Other.	General.	Other.
Raglan ..	824	1,697	..	..	1¼d.	¼d. H. and C.A.; 1d. separate Karioi, ½d. Whangape, ½d. Onewhero Ridings.
Kawhia ..	1,515	1,113				
West Taupo ..	1,594	287				
East Taupo ..	2,581	256				
Rotorua ..	984	1,307				
Tauranga ..	577	1,720	..	..	1⅛d, 1⅜d, 1⅝d.	1/10d. H. and C.A.; 1/8d., ⅛d., 1/10d., 1/11d. special.
Whakatane ..	1,716	779	*	*	*	*
Opotiki ..	1,440	1,438	¾d.	½d. separate, Waioeka and Ohiwa Ridings.		
Waiapu ..	1,121	711	1d.	⅝d. special, Tokomaru–Tuakau loan.		
Cook	1,950	6,393	¾d.	1/10d. H. and C.A.; thirteen, from 1/40d. to 1½d., various rates.		
Clifton ..	1,518	2,535	1¼d.	3/16d., 5/16d., 1⅝d., 2d. special, for loans.		
Taranaki ..	386		⅝d.	⅛d. H. and C.A.; ⅜d. Eltham Road loan.		
Hawera ..	381	19,541	¾d.	¼d. separate, Mangatoki, Eltham, and Okaiawa outlying districts.		
Egmont ..	254					
Stratford ..	784	5,081	..	..	¾d., 1d., 1¼d., 1 5/16d.	Separate, South ⅝d., East 1d., West ¾d., Ridings; special, various.
Patea	691	3,046	¾d.	⅝d. special, Kapara loan; ⅝d. Omoua loan; ¾d. separate, Kapara Riding.		
Waitotara ..	343	3,476	1d.			
Waimarino ..	1,315	4,018	¼d.	⅛d. special No. 2 Long Acre, ⅜d. No. 1, 7/16d. Denlair, 10/16d. Waikupu Districts.		
Wanganui ..	627					
Rangitikei ..	852	7,570	¾d.	⅛d. separate, Maungahoe, Otairi, Ohingaiti, Ridings; special in thirty special-rating districts.		

Kaitaia			6,778	½d.	½d. separate, Fitzherbert Riding.		
Oroua	..	213					
Pohangina	..	295	1,536	¾d.	¼d., ½d. separate; ten special, various, from $\frac{1}{10}$d. to 2d.		
Manawatu	..	267	3,000	⅝d.	Separate and special, various, to meet loans in special districts.		
Horowhenua	..	591	4,654	½d., ⅝d., ¾d.	Eleven special, various.		
Wairoa	..	1,887	1,773	⅝d.	$\frac{3}{16}$d., $\frac{5}{32}$d., $\frac{1}{64}$d. special over part of county.		
Hawke's Bay	..	3,232	6,833	¾d.			
Waipawa	..	990	9,495	..	..	¾d. in road districts, 1¾d outlying	$\frac{11}{16}$d. No. 2, ⅜d. No. 3, $\frac{1}{11}$d. No. 4, ⅔d. No. 6, $1\frac{1}{10}$d. No. 8 loans.
Woodville	..	164		..	..	1d., ⅛d.	Special rates in respect of special loans.
Patangata	..	652	2,376	½d., ¾d.	⅙d., $\frac{1}{12}$d., $\frac{12}{50}$d. special.		
Weber	..	95		¾d.	$\frac{7}{32}$d. for interest on loan.		
Pahiatua	..	302	3,600	..	..	1¼d.	Fifty-two special and various.
Akitio	..	328	1,048	⅜d.			
Castlepoint	..	150	457	1¼d.	$\frac{14}{120}$d., $\frac{45}{120}$d., $\frac{41}{120}$d., $\frac{1}{30}$d., $\frac{3}{80}$d. special.		
Eketahuna	..	170	2,332	..	..	1¾d.	Forty-six special and various for interest on loans.
Mauriceville	..	125	1,127	⅝d.	Seventeen special rates on small special-rating districts.		
Masterton	..	670	3,123	¾d.	$\frac{1}{16}$d., $\frac{1}{16}$d., ½d. separate in three ridings; special, various.		
Wairarapa South		445	5,419	..	⅛d. H. and C.A.; various special rates for interest on loans; ⅜d. special-rating district for maintenance Taratahi Water-race works	$1\frac{5}{16}$d.	
Featherston	..	965		⅝d.	$\frac{1}{12}$d. H. and C.A.; special, various, for interest on loans.		
Hutt	..	590	7,171	½d., ¾d.	½d. separate; special, $\frac{5}{16}$d., ⅕d., ⅓d., ⅝d., ⅜d.		

COUNTIES, 1902–1903—*continued*.

Counties.	Area in Square Miles (including Boroughs).	Population Census, March, 1901 (excluding Boroughs).	Rates struck by County on Capital Rateable Value.		On Unimproved Value.	
			General.	Other.	General.	Other.
Sounds ..	573	946				
Marlborough ..	3,812	6,518				
Kaikoura ..	673	1,765	$\frac{3}{4}$d.			
Collingwood ..	1,029	2,490	$\frac{1}{4}$d.	$\frac{1}{4}$d., $\frac{5}{16}$d. special for repayment of loans.		
Waimea ..	1,662	7,833	$\frac{3}{4}$d.	$\frac{1}{5}$d. H. and C.A.; $\frac{1}{12}$d., $\frac{3}{13}$d. special for loans.		
Buller ..	1,818	4,868	$1\frac{1}{2}$d.	$\frac{1}{2}$d. H. and C.A.; $3\frac{1}{4}$d. special, Charleston Riding.		
Inangahua ..	2,256	4,595	..	..	3d., $3\frac{1}{2}$d.	Three special, one $\frac{5}{16}$d. and two $\frac{1}{2}$d., in Reefton Town; $2\frac{1}{4}$d. Boatman's Irrigation District.
Grey ..	1,452	4,971	$1\frac{1}{2}$d.	$\frac{3}{8}$d. H. and C.A.		
Westland ..	4,420	4,405	$1\frac{1}{2}$d.			
Amuri ..	2,362	1,142	$\frac{1}{2}$d.	$\frac{3}{4}$d., $\frac{7}{16}$d., $\frac{5}{16}$d., special, for interest on loans.		
Cheviot ..	322	1,120	..	..	$\frac{7}{8}$d., 1d.	$\frac{1}{8}$d. Hawkswood Riding
Ashley ..	1,627	11,599				
Selwyn ..	2,597	30,787	..	$\frac{1}{8}$d. H. and C.A.; $\frac{1}{32}$d. bird-nuisance.		
Akaroa ..	294	3,669	$\frac{3}{8}$d.	$\frac{1}{4}$d. special, Wainui Wharf.		
Mount Herbert ..	59		$\frac{1}{2}$d. Port Levy, $\frac{3}{4}$d. Port Victoria			
Ashburton ..	2,542	11,342	$\frac{1}{4}$d.	$1\frac{1}{2}$d. Ruapuna No. 1 and No. 2 Districts; $\frac{1}{2}$d. Ashburton Forks Protective-works District; $\frac{1}{5}$d. Wakanui Protective-works District; $\frac{3}{4}$d. Mount Somers tramway.		
Geraldine ..	945	5,991	$\frac{1}{4}$d.	$\frac{3}{8}$d. to $\frac{9}{16}$d. water districts, also 1d. to 3d. per acre for maintenance.		
Levels ..	273	5,496	1d.			
Mackenzie ..	2,537	1,642	$\frac{5}{8}$d.			

Waimate ..	1,343	5,653	..	..	$\frac{7}{8}$d.	$\frac{1}{4}$d. Timaru Harbour Board; $\frac{5}{8}$d. Waihao water-rate for interest; $\frac{3}{4}$d. Waihao maintenance.
Waitaki ..	2,333	9,086	$\frac{1}{2}$d.	Separate, $\frac{3}{16}$d. Moeraki Riding, $\frac{3}{16}$d. Waiarika Riding, $\frac{2}{16}$d. Otepopo Riding, $\frac{4}{16}$d. Kakanui Riding; also special rates, maintenance and interest Papakaio Water-race.		
Waihemo ..	336	2,014	$\frac{3}{4}$d.			
Waikouaiti ..	318	4,082	$\frac{3}{4}$d.			
Peninsula ..	37	2,561				
Taieri ..	930	7,179	$\frac{3}{4}$d.	$\frac{1}{8}$d. H. and C.A.; $\frac{109}{1432}$d. Otago Charitable Aid Board; $\frac{70}{1432}$d. Otago District Hospital Board; $\frac{3}{8}$d. special, South Taieri District.		
Bruce ..	503	4,762	$\frac{3}{4}$d. outlying, $\frac{3}{8}$d. road districts	$\frac{3}{16}$d. H. and C.A.; eight special, various, from $\frac{5}{6}$d. to $1\frac{1}{4}$d.; $\frac{1}{6}$d., $\frac{5}{16}$d. separate.		
Clutha ..	946	6,445	$\frac{3}{4}$d.	$\frac{1}{2}$d. separate, Catlin's, South Molyneux, Richardson Ridings; special for interest, $\frac{1}{8}$d. South Molyneux loan, $\frac{1}{8}$d. Richardson Riding loan, $\frac{2}{5}$d. Clinton Road Board loan, $\frac{1}{4}$d. Pomahaka Riding loan.		
Tuapeka ..	1,365	6,272	$\frac{3}{4}$d.			
Maniototo ..	1,239	3,792	$\frac{3}{4}$d.			
Vincent ..	2,684	4,362	1d.	$1\frac{1}{2}$d. for interest Clyde Water-race loan, $2\frac{1}{2}$d. Blackman's loan.		
Lake	3,712	2,535	1d.	$\frac{1}{8}$d. special, Skipper's Bridge loan.		
Southland ..	3,852	22,583	..	$\frac{9}{50}$d. H. and C.A.; $\frac{3}{8}$d. special, West Plains	$1\frac{1}{20}$d.	$\frac{1}{3}$d. South Hillend, $\frac{1}{3}$d. Wyndham Road District, $\frac{1}{6}$d. Otaraia District.
Wallace ..	3,404	7,989	$\frac{3}{4}$d.	$\frac{1}{8}$d. H. and C.A.; separate rates in four ridings.		
Fiord ..	3,040	124				
Stewart Island ..	651	253	$\frac{3}{4}$d.	$\frac{1}{4}$d. H. and C.A.		
Chatham Islands	375	207				

* No information.

Town Districts, 1902–1903.

Town Districts.	Estimated Population 31st March, 1903.	Number of			Amount of Rate levied in the Pound on the Capital, Annual, or Unimproved Value of Property.
		Dwellings.	Ratepayers.	Rateable Properties.	
					s. d.
Kamo	250	76	80	102	0 $0\frac{3}{4}$
Helensville	450	85	93	111	*0 5
Papakura	282	79	156	203	0 $0\frac{1}{2}$
Te Awamutu	350	50	63	75	0 $0\frac{3}{4}$
Kihikihi (1902)	263	62	99	141	0 $0\frac{3}{4}$
Ngaruawahia	300	100	140	147	0 $0\frac{3}{4}$
Rotorua	1,200	250	..	..	..
Opotiki	800	300	205	280	0 $0\frac{3}{4}$
Waitara (Raleigh)	860	200	266	..	0 $0\frac{3}{4}$(1)
Opunake	600	150	165	..	0 $0\frac{3}{4}$
Inglewood	945	..	..	..	0 $0\frac{3}{4}$(2)
Normanby	356	86	126	126	†0 5
Manaia	430	72	153	341	0 $0\frac{3}{4}$(3)
Waverley	416	112	121	121	0 $0\frac{3}{4}$
Lethbridge (Turakina)	250	60	45	68	*0 8
Bull's	550	123	134	179	*1 0
Halcombe	376	90	150	730	*1 0(4)
Clyde (Wairoa)	720	135	175	340	0 $0\frac{3}{4}$
Taradale	850	165	192	198	0 $0\frac{1}{2}$
Ormondville	470	106	151	215	0 $2\frac{3}{8}$
Waipawa	669	168	121	196	†0 $1\frac{7}{8}$(5)
Kaikora North	268	60	105	135	*0 6
Featherston	629	120	150	190	0 $0\frac{3}{4}$(6)
Johnsonville	503	120	132	..	0 $0\frac{1}{2}$
Havelock	316	76	79	153	0 1
Amberley	417	97	92	130	0 $0\frac{3}{4}$
Southbridge	200	120	240	..	0 $0\frac{3}{4}$
Hampstead	1,250	252	270	322	0 $0\frac{1}{2}$
Tinwald	560	111	160	233	0 $0\frac{5}{8}$
Geraldine	900	205	208	316	0 $0\frac{3}{4}$
Greytown (Allanton)	167	49	70	115	0 $0\frac{1}{2}$
Outram	420	61	66	110	0 $0\frac{1}{4}$(7)
Clinton	440	95	120	126	*1 0
Wyndham	417	115	116	354	*1 0
Otautau	625	111	122	186	0 $0\frac{3}{4}$(8)

* On the annual value. † On the unimproved value.

(1) Special, $\frac{1}{4}$d. (2) Special, $\frac{1}{8}$d. (3) County rate, $\frac{3}{4}$d. (4) Special, $1\frac{3}{4}$d. (5) Special, $\frac{1}{8}$d. on capital value. (6) Special, $\frac{1}{4}$d.; separate, $\frac{1}{2}$d. (7) Water rate, 7 per cent. on the annual value where water supplied. (8) Special, $\frac{3}{8}$d.

Road Districts, 1902–1903.

County and District.	Population (Census, 1901).	Number of			Amount of Rate levied in the Pound on the Capital, Annual, or Unimproved Value.
		Dwellings.	Ratepayers.	Rateable Properties.	
					d.
Mongonui Whangaroa Bay of Islands Hokianga Hobson	(No road districts.)				
Whangarei—					
Hikurangi	495	70	120	146	3
Kaurihohore	191	47	45	47	3
Kensington (merged)	49	9	18	18	..
Marua	274	63	87	114	3
Maungakaramea	288	71	110	130	3
Maunu	584	155	142	160	3
Otonga	300	55	70	73	3
Parua Bay	215	50	200	255	3
Ruarangi	103	30	57	57	3
Waikiekie	205	27	92	211	3
Waipu North	224	48	82	117	3
Whareora	92	64	64	80	4
Otamatea—					
Mangawai	268	54	90	95	3
Mareretu	..	48	115	121	3
Matakohe	423	87	158	275	4
Whakapirau (no Board).					
Rodney—					
Ahuroa	41	14	42	72	3
Albertland North	65	12	42	42	3
Albertland South	322	79	145	172	3
Komokoriki	62	15	44	47	3
Mahurangi East	151	23	96	96	1
Mahurangi Upper	947	..	..	..	3
Mainene	74	11	26	82	3
Matakana East	132	21	37	39	1
Matakana West	172	57	69	154	3
Omaha	357	..	..	..	3
Puhoi	596	80	130	..	3
Tauhoa	371	59	91	..	3
Warkworth (in first year)	..	..	..	..	..
Wharehine	96	20	37	38	3
Waitemata—					
Kaukapakapa	543	100	182	392	3
Pukeatua	560	90	217	264	3
Whangaparaoa	66	25	35	53	3

Road Districts; 1902–1903—*continued.*

County and District.	Population (Census, 1901).	Number of Dwellings.	Number of Ratepayers.	Number of Rateable Properties.	Amount of Rate levied in the Pound on the Capital, Annual, or Unimproved Value.
Eden—					d.
Arch Hill	1,671	366	296	471	1s.(1)
Avondale	1,075	230	385	495	¾(2)
Eden Terrace	2,011	430	315	438	¾(3)
Epsom	750	165	170	191	¾
Mount Albert	2,085	460	611	791	¾(4)
Mount Eden	5,129	1250	1,150	1,390	¾(5)
Mount Roskill	581	127	187	258	¾(6)
Mount Wellington	954	204	200	576	⅝
One-tree Hill	1,283	204	184	272	⅜(7)
Panmure Township	259	70	80	100	½
Point Chevalier	684	33	44	55	¾
Remuera	2,186	450	414	548	¾
Tamaki West	375	106	125	165	⅝
Manukau—					
Awhitu	413	103	132	160	¾
Drury	382	83	154	204	¾
Howick Town	224	52	119	119	¾
Hunua	266	54	125	220	*1 17/128(8)
Karaka	188	50	147	..	¾
Mangere	702	200	158	209	½
Manurewa	260	60	74	141	½
Maraetai	82	25	24	32	*1½(9)
Mauku	380	105	138	150	½(10)
Maungatawhiri	378	50	62	95	¾
Mercer Township	229	50	49	86	¾
Opaheke	369	85	114	280	¾(11)
Otahuhu	1,211	320	281	379	¾
Pakuranga	271	65	74	99	¾
Papakura	373	86	108	119	*1 33/100(12)
Paparata	373	89	116	160	¾(13)
Paparoa	166	46	71	93	¾
Papatoetoe	176	40	39	39	¾
Pokeno	398	82	101	138	¾(14)
Pollok Settlement	88	20	37	46	½(15)
Pukekohe East	942	325	219	264	¾
Pukekohe West	1,153	221	250	261	¾(16)
Tamaki East	580	119	118	149	¾
Turanga	227	45	80	90	¾(17)
Waipipi	905	300	300	350	¾(18)
Wairoa	792	192	203	313	¾(19)
Waiuku	492	200	220	225	¾

(1) On annual value; 6½d. special. (2) ½d. separate, hospital and charitable aid. (3) 26/40d. special. (4) 5/16d. special, drainage; ⅛d. separate, hospital and charitable aid. (5) ⅛d. special, for lighting. (6) ⅛d. separate, for gas. (7) 1d. separate, hospital and charitable aid. (8) 1 7/32d., 2⅛d., special in special-rating divisions. (9) ¼d. separate, hospital and charitable aid. (10) ½d. and 5/16d. special not collected. (11) ½d. special. (12) 1 33/100 special on portion of district. (13) ⅜d. special. (14) ⅛d. special. (15) ¼d. special. (16) ¾d. in Buckland Subdivision only. (17) ⅓d. special. (18) ¼d., ⅛d., and ⅛d. special. (19) ½d. separate, hospital and charitable aid. * On unimproved value.

Road Districts, 1902–1903—*continued.*

County and District.	Population (Census, 1901).	Number of			Amount of Rate levied in the Pound on the Capital, Annual, or Unimproved Value.
		Dwellings.	Ratepayers.	Rateable Properties.	
					d.
Coromandel Thames Ohinemuri } (No road districts.)					
Piako—					
Matamata	262	60	50	70	1
Waitoa	1,322	257	288	364	1
Waikato—					
Cambridge	562	100	155	155	1
Huntly	966	104	204	367	1
Kirikiriroa	964	178	255	255	1
Tamahere	248	57	61	61	1
Whangamarino	443	80	209	421	1
Waipa—					
Newcastle	391	82	148	171	1
Pukekura	810	186	270	430	1
Rangiaohia	507	81	107	120	1
Tuhikaramea	98	30	56	56	1
Raglan—					
Karamu (no Board)	78	..	..	..	..
Onewhero (merged)	197	..	..	..	..
Te Akau (no Board)	32	..	..	..	..
Kawhia West Taupo East Taupo Rotorua } (No road districts.)					
Tauranga—					
Katikati	409	84	146	265	*1 7/8
Te Puke	477	140	180	208	1 1/2
Te Puna	169	36	135	140	(1)
Whakatane Waiapu Opotiki } (No road districts.)					
Cook—					
Aroha	58	11	12	12	(1)
Hangaroa	..	20	22	42	(1)
Kaiti	700	170	194	290	3/4 (2)
Ngatapa	489	105	127	164	(3)
Ormond	482	70	99	166	(1)
Patutahi	638	75	99	230	(4)
Pouawa	85	45	29	53	(1)

(1) No rate struck. (2) 3/8d. and 1/2d. special. (3) 1 1/2d. special; no general rate
(4) 1/4d. special; no general rate. * On unimproved value.

Road Districts, 1902–1903—*continued.*

County and District.	Population (Census, 1901).	Number of Dwellings.	Number of Ratepayers.	Number of Rateable Properties.	Amount of Rate levied in the Pound on the Capital, Annual, or Unimproved Value.
Cook—*continued.*					d.
Poverty Bay	1,050	140	258	258	(1)
Taruheru	225	56	60	70	(2)
Te Arai	294	56	74	188	(3)
Titirangi	44	11	25	36	(4)
Waikohu	328	70	75	75	(2)
Waimata	264	48	48	50	..
Waipaoa	80	10	10	17	(2)
Whataupoko	1,148	235	285	330	¾ (5)
Clifton. (No road districts.)					
Taranaki—					
Barrett	439	119	114	163	½
Carrington	341	83	96	170	¾ (6)
Egmont	635	174	169	277	¾ (7)
Elliot	235	54	70	78	¾
Frankley	231	101	101	109	¾
Henui	393	120	140	170	¾
Hurford, Upper	56	16	18	18	¾ (8)
Mangorei	276	40	70	82	¾
Moa	2,836	500	550	600	¾ (9)
Oakura (no information)	333	..	..	..	..
Okato	345	70	80	145	¼
Omata (no information)	294	..	..	..	..
Parihaka (no information)	1,514	..	..	..	..
Tataraimaka (no information)	152	..	..	..	..
Waitara West (no information)	814	..	..	..	..
Waiwakaiho (no information)	350	..	..	..	..
Egmont. (No road districts.)					
Stratford—					
Manganui	1,734	355	395	581	*1¼
Hawera—					
Waimate	2,619	360	400	590	¾ (10)
Patea—					
Kohi	166	34	30	30	(2)
Motoroa	60	18	20	20	(2)
Okotuku	134	24	29	33	(2)
Patea East	401	75	84	355	(2)
Patea West	777	195	204	630	(11)
Wairoa	105	22	30	30	(2)
Waitotara-Momohaki	496	105	149	..	¾
Whenuakura-Waitotara	313	42	44	44	(2)

(1) $\frac{3}{16}$d. special; no general rate. (2) No rate struck. (3) $\frac{1}{6}$d. and 1d. special; no general rate. (4) ½d. special; no general rate. (5) ½d. special; No. 2, 1d.; No. 3, ½d.; No. 5, ½d.; No. 6, 1½d. (6) $\frac{7}{32}$d. special. (7) $\frac{1}{6}$d., ⅛d., $\frac{1}{9}$d., and $\frac{2}{9}$d. special. (8) $\frac{5}{8}$d. special. (9) $\frac{1}{10}$d. special. (10) Special, various, ¼d. to 1¾d. (11) $\frac{1}{10}$d. special; no general rate.
* On unimproved value.

Road Districts, 1902–1903—*continued.*

County and District.	Population (Census, 1901).	Number of			Amount of Rate levied in the pound on the Capital, Annual, or Unimproved Value.
		Dwellings.	Ratepayers.	Rateable Properties.	
					d.
Waitotara Waimarino } (No road districts.)					
Wanganui—					
Kaitoke	606	125	120	157	$\frac{3}{4}$
Kaukatea	198	47	43	116	$\frac{3}{4}$
Mangawhero	973	450	400	700	$\frac{1}{2}$
Mataongaonga	..	200	212	340	$\frac{1}{2}$
Purua	904	220	190	291	$\frac{3}{4}$
Wangaehu Upper (no information) ..	695	..	..	..	..
Rangitikei. (No road districts.)					
Oroua—					
Manchester	3,313	764	640	2,175	$\frac{1}{2}$(1)
Kairanga Pohangina Kiwitea Manawatu } (No road districts.)					
Horowhenua—					
Otaki	1,280	300	320	1,171	$\frac{1}{2}$(2)
Te Horo	512	110	135	500	$\frac{1}{2}$
Wirokino	2,862	790	693	1,100	$\frac{1}{2}$(3)
Wairoa Hawke's Bay } (No road districts.)					
Waipawa—					
Norsewood	1,206	208	280	300	*$1\frac{3}{8}$
Ruataniwha North	651	114	82	123	*$\frac{1}{2}$
Takapau	608	105	65	117	*$\frac{1}{2}$(4)
Waipawa	274	58	64	78	*$\frac{3}{8}$
Waipukurau	741	200	210	292	*$\frac{3}{4}$
Patangata—					
Oero	305	55	59	78	$\frac{1}{2}$
Patangata	294	47	51	99	$\frac{3}{16}$
Porangahau	433	90	76	153	$\frac{11}{16}$
Tamumu	185	20	20	31	$\frac{1}{4}$
Wallingford	192	23	24	56	$\frac{1}{4}$
Wanstead	143	21	27	..	(5)

(1) Special, various, from $\frac{1}{24}$d. to $\frac{1}{8}$d. (2) $\frac{1}{2}$d. special. (3) Special, various.
(4) $\frac{1}{2}$d. special. (5) No rate struck. * On unimproved value.

Road Districts, 1902–1903—*continued.*

County and District.	Population (Census, 1901).	Number of Dwellings.	Number of Ratepayers.	Number of Rateable Properties.	Amount of Rate levied in the Pound on the Capital, Annual, or Unimproved Value.
					d.
Weber, Pahiatua, Castlepoint, Eketahuna, Mauriceville, Woodville, Masterton, Akitio — (No road districts.)					
Wairarapa South—					
Taratahi-Carterton	2,523	560	489	696	*1 5/16 (1)
Featherston. (No road districts.)					
Hutt—					
Makara	257	39	45	66	1/4 (2)
Seatoun	432	157	160	160	3/4 (2)
Sounds. (No road districts.)					
Marlborough—					
Awatere	785	150	171	221	3/4
Omaka	1,603	326	393	487	3/4
Pelorus	1,218	233	258	439	*1 1/2 (3)
Picton	847	188	161	254	3/4
Spring Creek	819	137	137	177	1/2
Wairau	930	200	210	224	3/4
Kaikoura. (No road districts.)					
Collingwood—					
Collingwood	1,078	350	309	555	3/4
Takaka	1,342	346	330	786	3/4
Waimea—					
Dovedale	286	50	50	50	(4)
Moutere Upper	397	100	100	..	(4)
Riwaka	687	145	..	..	(4)
Stoke	1,183	210	..	..	(4)
Suburban North	559	120	126	..	(4)
Waimea West	460	78	78	70	(4)
Buller, Inangahua, Grey, Westland, Amuri, Cheviot — (No road districts.)					

(1) Special, various, for interest on loans. (2) 1/4d. special. (3) 3/4d. special.
(4) No rate struck. * On unimproved value.

Road Districts, 1902–1903—*continued.*

County and District.	Population (Census, 1901).	Number of Dwellings.	Number of Ratepayers.	Number of Rateable Properties.	Amount of Rate levied in the Pound on the Capital, Annual, or Unimproved Value.
Ashley—					d.
Ashley	726	500	200	280	$\frac{3}{4}$
Cust	713	161	141	209	$\frac{7}{16}$
Eyreton	1,566	336	273	273	$\frac{5}{8}$
Eyreton West	401	85	74	74	$\frac{1}{2}$
Kowai	1,851	550	650	770	$\frac{3}{4}$
Mandeville and Rangiora	2,257	532	439	690	$\frac{5}{8}$
Oxford	1,973	550	466	863	$\frac{3}{4}$ (1)
Waipara	1,695	500	450	533	$\frac{1}{2}$
Selwyn—					
Avon	3,889	1145	865	1,110	1s. (2)
Courtenay	2,560	428	463	754	$\frac{7}{16}$
Ellesmere	3,497	..	597	932	$\frac{9}{16}$
Halswell	1,278	230	200	230	$\frac{3}{4}$
Heathcote	2,995	550	808	975	$\frac{3}{4}$ (3)
Lake Coleridge	177	27	31	83	$\frac{1}{2}$
Lincoln	1,213	374	253	331	$\frac{1}{2}$ (4)
Malvern	965	170	152	320	$\frac{1}{2}$
Malvern East	625	141	159	292	$\frac{1}{4}$
Malvern South	428	80	211	342	$\frac{1}{2}$
Rakaia	825	200	210	357	$\frac{3}{8}$ (5)
Riccarton	5,713	..	1,138	1,352	$\frac{3}{4}$
Spreydon	1,457	346	473	497	*1$\frac{3}{16}$ (6)
Springs	1,872	460	420	452	$\frac{9}{16}$ (7)
Taitapu	324	95	69	78	$\frac{3}{4}$
Templeton	2,338	569	638	686	$\frac{7}{16}$ (8)
Waimakariri Upper	235	21	13	41	(9)
Akaroa—					
Akaroa and Wainui	1,308	270	248	248	$\frac{11}{16}$
Le Bon's Bay	316	56	82	91	$\frac{3}{4}$ (10)
Little River	816	270	180	160	$\frac{5}{8}$
Okain's Bay	520	90	104	125	$\frac{3}{4}$
Pigeon Bay	258	57	50	60	$\frac{5}{8}$
Port Levy	159	32	48	58	$\frac{1}{2}$
Port Victoria	292	47	66	49	$\frac{3}{4}$
Mount Herbert. (No road districts.)					
Ashburton—					
Anama	..	80	86	139	$\frac{1}{2}$
Ashburton Upper	2,002	385	600	725	$\frac{3}{8}$ (11)
Coldstream	319	80	85	158	$\frac{1}{2}$
Longbeach	1,335	..	214	360	$\frac{6}{16}$

(1) 3d per acre, Eyre Water-race. (2) On annual value; special, 6d.; separate $\frac{1}{2}$d., $\frac{1}{2}$d., 2d., 7d. (3) Special, hospital and charitable aid, $\frac{1}{2}$d.; Waimakariri River rate, $\frac{2}{64}$d.; separate drainage rate, $\frac{1}{2}$d.; small-birds rate, $\frac{1}{32}$d. (4) $\frac{1}{2}$d. separate. (5) Separate, $\frac{1}{32}$d., small birds. (6) $\frac{2}{64}$d. separate. (7) $\frac{2}{64}$d. Waimakariri, separate. (8) Separate, $\frac{1}{32}$d., small birds; special, $\frac{2}{64}$d., Waimakariri. (9) No rate struck. (10) $\frac{1}{4}$d. special. (11) $\frac{3}{8}$d. separate, No. 5 Ward. * On unimproved value.

Road Districts, 1902–1903—*continued.*

County and District.	Population (Census, 1901).	Number of			Amount of Rate levied in the Pound on the Capital, Annual, or Unimproved Value.
		Dwellings.	Ratepayers.	Rateable Properties.	
					d.
Ashburton—*continued.*					
Mount Hutt	1,500	255	239	372	¼
Mount Somers	928	195	231	310	½
Rangitata	797	130	136	218	¼
South Rakaia	1,480	355	376	530	⅛
Wakanui	1,230	228	280	324	⅛
Geraldine—					
Geraldine	2,250	485	498	837	¾
Mount Peel	493	120	120	175	½
Temuka	2,380	..	510	..	¾
Levels, Mackenzie, Waimate, Waitaki, Waihemo, Waikouaiti	(No road districts.)				
Peninsula—					
Otago Heads	304	63	63	103	¾
Peninsula	1,324	219	333	393	¾
Portobello	796	365	361	371	¾
Tomahawk	137	20	29	43	¼(1)
Taieri. (No road districts.)					
Bruce—					
Balmoral	476	74	86	95	(2)
Inch-Clutha (Road and River) ..	344	60	64	72	½
Mount Stuart	618	100	124	124	⅜
Clutha, Tuapeka, Maniototo, Vincent, Lake	(No road districts.)				
Southland—					
Knapdale	1,596	293	328	408	*17/20
Oteramika	2,249	..	..	..	½(3)
Tuturau	733	..	134	140	*¾
Wallace, Fiord, Stewart Island, Chatham Islands	(No road districts.)				

(1) ¼d. special. (2) No rate struck. (3) ½d. separate on one subdistrict only.
* On unimproved value.

SECTION XVI.—LICENSES AND LICENSED HOUSES, ETC.

Licenses and Licensed Houses.

During the year ended the 31st March, 1903, 2,415 licenses for the sale of intoxicating liquors were granted. Of these, 1,504 were publicans' and accommodation licenses, 6 New Zealand wine, 62 packet, 174 wholesale, and 669 conditional licenses. The fees paid amounted to £54,334, and formed part of the revenue of the local governing bodies of the districts in which the licenses were issued. Particulars are given in the following table:—

Number of Licenses granted during the Year 1902–1903, and the Amount of Fees paid to Local Bodies therefor.

Licenses.	In Counties.	In Boroughs.	Total.
Publicans' licenses	593	698	1,291
Accommodation licenses	213	..	213
Total licensed houses	806	698	1,504
New Zealand wine licenses	1	5	6
Packet licenses	13	49	62
Wholesale licenses	15	159	174
Conditional licenses	528	141	669
Total licenses granted	1,363	1,052	2,415
Amount of license fees paid to local bodies	£19,380	£34,954	£54,334

The average number of persons to each licensed house in counties and boroughs respectively, for 1902–1903, is next shown:—

	Number of Licensed Houses.*	Estimated Population.	Average Number of Persons to each Licensed House.
Counties	806	412,383	512
Boroughs	698	382,957	549
Totals	1,504	795,340	529

In 1901–1902 the number of licensed houses in counties was 823, and those in boroughs 690, giving a total of 1,513 houses, or 9 more than in 1902–1903. The average number of persons to a licensed house increased from 507 in 1901–1902 to 512 in 1902–1903 in counties, and in boroughs from 508 in the former to 549 in the latter year.

* *I.e.*, houses holding publicans' or accommodation licenses.

The annual fees paid for licenses are—

	£
(1.) For a publican's license—	
(*a.*) Within the limits of a borough or town district ..	40*
(*b.*) Outside the aforesaid limits	25
(2.) For a New Zealand wine license	1
(3.) For an accommodation license, a sum to be determined by the Licensing Committee, not exceeding..	20
(4.) For a packet license—	
(*a.*) For a vessel exceeding 50 tons register	10
(*b.*) For a vessel not exceeding 50 tons register	5
(5.) For a wholesale license	20
(6.) For a conditional license, according to duration of license, a sum not exceeding	30

The approximate capital value of the licensed houses in the counties was stated at £770,170, and the same for certain of the boroughs at £623,069. There was, besides, an annual value of £112,551 for other licensed houses in the boroughs, which, capitalised at 6 per cent., would represent £1,875,850. The capital value of all licensed houses would therefore be about £3,269,089.

The total number of persons engaged in or connected with the sale or manufacture of wine, spirits, beer, cordials, &c., was returned at the census of 1901 as under :—

	Males.	Females.	Persons.
Hotelkeepers	1,341	215	1,556
Relative assisting	133	631	764
Manager, clerk	104	22	126
Hotel servant, cook	1,376	2,557	3,933
Barman, barmaid	178	349	527
Manager, secretary, steward of club-house	115	27	142
Wine, spirit, merchant	50	3	53
Assistant	10	1	11
Clerk, storeman	55	1	56
Traveller	31	..	31
Cordial, &c., seller	6	..	6
Brewer, bottler, and others engaged in brewing	606	4	610
Relative assisting	8	1	9
Maltster and assistants	147	..	147
Wine-manufacturer	16	..	16
Cordial, &c., maker, bottler	231	7	238
Assistant, clerk, traveller, &c.	130	2	132
Totals	4,537	3,820	8,357

* Between the hours of six in the morning and ten at night. For an eleven o'clock license an additional £5 must be paid.

Local Option Poll.

Under "The Alcoholic Liquors Sale Control Act, 1893," each electoral district constituted for the election of a member of the House of Representatives is a licensing district, and electors for the House of Representatives are also electors under the Licensing Acts.

Under the Amendment Act of 1895 the licensing poll is taken at the same time as the general election of members of the House of Representatives. The questions for the decision of the voters are,—

(1.) Whether the number of licenses existing in the district shall continue?

(2.) Whether the number shall be reduced?

(3.) Whether any licenses whatever shall be granted?

The voter may vote for one or two of these proposals, but no more.

The method of determining the result of the poll in each district by the Returning Officer is as follows:—

(1.) If the number of votes recorded in favour of the continuance of existing licenses is an absolute majority of all the voters whose votes were recorded, the proposal is deemed to be carried, and the licenses continue until the next poll, subject to certain provisions in special cases.

(2.) If the number of votes recorded in favour of a reduction in the number of licenses is an absolute majority of all the voters whose votes were recorded, the proposal is deemed to be carried, and supersedes the proposal for continuance of licenses. The Licensing Committee then reduces publicans' licenses by not less than 5 per cent. or more than 25 per cent. of the total number existing, excluding forfeitures. Provision is made that when a reduction vote is carried the licenses shall be reduced by one at least when the total number does not exceed ten, two when not over thirty, and three at least when the licenses exceed thirty.

(3.) If the number of votes recorded in favour of the proposal that no license shall be granted is not less than three-fifths of all the voters whose votes were recorded, the proposal is declared to be carried, and supersedes the proposal for reduction and for continuance, and no licenses can be granted.

(4.) If none of the proposals respecting licenses is carried by the prescribed majority the licenses continue as they are until next poll, subject to certain provisions in special cases.

The result of the poll taken on the 25th November, 1902, as made up from returns received from the officer in charge of the poll in each licensing district, is as follows:—

District.	Number of Persons on Roll.	Votes recorded for			Total Number of Persons who recorded Valid Votes.	Number of Men and Women who recorded Votes (including Informal).			Result of Poll.
		Continuance.	Reduction.	No License.		Men.	Women.	Total.	
Bay of Islands ..	4,016	1,759	567	850	2,750	1,753	1,052	2,805	Continuance carried.
Marsden	4,886	1,738	1,709	2,032	3,844	2,358	1,515	3,873	No proposal carried.
Kaipara	4,734	2,037	1,037	1,353	3,560	2,309	1,270	3,579	Continuance carried.
Waitemata ..	5,778	2,234	1,627	1,648	4,035	2,430	1,730	4,160	"
City of Auckland ..	19,976	7,345	6,683	6,524	14,594	8,267	6,849	15,116	"
Grey Lynn ..	5,419	1,829	2,197	2,175	4,107	1,956	2,196	4,152	Reduction carried.
Eden	5,102	1,754	1,693	1,638	3,537	1,918	1,776	3,694	No proposal carried.
Parnell	6,188	2,062	1,538	1,435	3,852	2,030	1,919	3,949	Continuance carried.
Manukau	5,852	2,268	1,964	1,927	4,478	2,231	1,379	4,610	"
Franklin	4,851	1,584	1,588	1,737	3,361	2,089	1,346	3,435	No proposal carried.
Thames	5,501	1,996	1,768	2,090	4,178	2,275	1,967	4,242	"
Ohinemuri ..	5,281	1,956	1,255	1,808	3,795	2,527	1,367	3,894	Continuance carried.
Waikato	5,236	2,506	1,387	1,587	4,165	2,548	1,732	4,280	"
Bay of Plenty ..	5,728	2,077	1,182	1,838	4,225	2,815	1,596	4,411	No proposal carried.
Waiapu	6,281	2,295	1,970	2,568	4,879	3,139	1,835	4,974	"
Hawke's Bay ..	5,580	1,636	1,157	1,417	3,133	2,096	1,165	3,261	Continuance carried.
Napier	5,483	1,749	2,080	2,006	3,854	2,161	1,899	4,060	Reduction carried.
Waipawa	5,178	1,802	1,239	1,640	3,544	2,279	1,314	3,593	Continuance carried.
Pahiatua	4,618	1,601	1,058	1,800	3,464	2,201	1,354	3,555	No proposal carried.
Masterton	5,332	1,945	1,396	1,906	3,930	2,412	1,586	2,998	"
Wairarapa	4,750	2,015	1,245	1,727	3,972	2,465	1,609	4,074	Continuance carried.
Egmont	5,004	1,862	863	1,403	3,414	2,303	1,278	3,581	"
Taranaki	5,543	2,347	1,542	2,021	4,402	2,542	2,037	4,579	"
Hawera	5,777	2,112	1,659	2,133	4,295	2,669	1,834	4,503	No proposal carried.
Patea	6,387	2,195	1,842	2,265	4,611	3,034	1,832	4,866	"
Rangitikei	5,096	1,863	707	1,342	3,371	2,457	1,114	3,571	Continuance carried.
Wanganui	6,504	2,409	1,885	2,267	4,745	2,741	2,215	4,956	"
Oroua	4,715	1,570	1,081	1,505	3,100	1,782	1,461	3,243	"
Palmerston ..	6,116	2,365	1,473	1,976	4,637	2,638	2,028	4,666	"
Manawatu	4,478	1,587	1,096	1,400	3,109	2,014	1,238	3,252	"
Otaki	3,743	1,345	955	1,062	2,464	1,559	1,017	2,576	"
Hutt	5,064	1,674	1,585	1,920	3,721	2,157	1,763	3,920	No proposal carried.
City of Wellington ..	21,218	6,749	7,325	7,496	15,175	8,669	7.312	15,981	"

Newtown* ..	6,665	1,869	2,777	2,995	4,985	2,670	2,447	5,117	No-license carried.
City of Nelson ..	5,517	2,515	1,527	1,327	4,243	2,267	2,075	4,342	Continuance carried.
Motueka	4,460	1,745	595	799	2,657	1,796	907	2,703	"
Buller	5,431	2,413	1,149	1,593	4,102	2,665	1,487	4,152	"
Grey	5,511	1,746	1,399	1,524	3,393	2,297	1,154	3,451	"
Westland	4,668	2,179	835	888	3,220	2,124	1,153	3,277	"
Wairau	5,355	2,303	1,671	1,869	4,323	2,643	1,779	4,422	"
Hurunui	4,519	1,784	1,395	1,632	3,472	2,279	1,298	3,577	"
Kaiapoi	4,725	1,601	2,132	2,319	3,936	2,134	1,852	3,986	Reduction carried.
Riccarton	4,331	1,646	1,306	1,365	3,236	1,404	1,908	3,312	Continuance carried.
Avon	5,661	1,898	2,021	2,187	4,169	2,130	2,155	4,285	No proposal carried.
City of Christchurch	19,769	7,897	7,484	7,888	16,298	8,367	8,458	16,825	"
Lyttelton	4,866	1,782	1,900	2,012	3,874	1,960	1,982	3,942	"
Ellesmere	3,890	1,489	1,162	1,336	2,890	1,724	1,242	2,966	Continuance carried.
Courtenay	4,227	1,320	1,512	1,644	3,040	1,801	1,352	3,153	No proposal carried.
Selwyn	4,339	1,258	1,608	1,804	3,081	2,017	1,222	3,239	Reduction carried.
Ashburton	5,876	1,734	2,489	2,870	4,625	2,772	1,962	4,734	No-license carried.
Geraldine	4,305	1 683	1,580	1,796	3,578	2,058	1,575	3,633	No proposal carried.
Timaru	5,857	2,175	2,427	2,637	4,856	2,679	2,245	4,924	"
Waitaki	4,445	1,481	1,674	1,896	3,411	2,043	1,422	3,465	"
Oamaru	5,221	1,801	2,144	2,459	4,319	2,382	2,025	4,407	"
Mount Ida	4,296	1,596	1,319	1,569	3,251	2,174	1,180	3,354	"
Waikouaiti ..	4,333	1,311	1,524	1,698	3,017	1,767	1,336	3,103	Reduction carried.
Chalmers	6,031	1,676	2,669	2,773	4,558	2,345	2,324	4,669	No-license carried.
City of Dunedin ..	23,133	7,269	8,937	8,518	17,240	8,436	8,968	17,404	Reduction carried.
Caversham	6,342	2,399	2,862	2,938	5,397	2,727	2,808	5,535	"
Taieri	4,727	1,626	1,729	2,031	3,695	2,132	1,690	3,822	No proposal carried.
Bruce*	4,871	1,525	2,157	2,372	3,869	2,103	1,826	3,929	No-license carried.
Tuapeka	4,699	1,628	1,642	1,841	3,587	2,307	1,384	3,691	No proposal carried.
Clutha	4,974	1,368†	..	2,245‡	3,613	2,245	1,476	3,721	Non-restoration carried.
Mataura	6,055	1,877	2,353	2,939	4,825	2,943	2,016	4,959	No-license carried.
Wakatipu	4,947	2,090	1,359	1,654	3,837	2,536	1,422	3,958	Continuance carried.
Wallace	5,154	1,957	1,836	2,323	4,201	2,688	1,714	4,402	No proposal carried.
Invercargill ..	6,339	2,043	2,855	3,079	5,147	2,660	2,556	5,216	Reduction carried.
Awarua	4,835	1,499	1,858	2,208	3,713	2,195	1,580	3,775	"
Totals	415,789	148,449	132,240	151,524	309,959§	180,294	138,565	318,859	

* Election since declared void. † For restoration. ‡ For non-restoration. § Not including 8,900 informal votes.

From the foregoing table it will be seen that 148,449 votes were recorded in favour of continuing existing licenses—including one district, that of Clutha, where the vote (1,368) was for restoration of the licenses cancelled at the poll taken in 1899—132,240 for reduction, and 151,524 for no license (including 2,245 votes cast for non-restoration in the Clutha district).

In twenty-nine of the sixty-eight licensing districts the majority of the voters was in favour of continuance, in twenty-four no proposal was carried, in nine reduction, and in six no-license was carried, but in two of these latter the poll on petition was declared invalid. In twenty-four of the districts—Marsden, Grey Lynn, Franklin, Thames, Waiapu, Napier, Pahiatua, Hutt, Waitaki, Oamaru, Waikouaiti, Kaiapoi, Avon, Lyttelton, Courtenay, Selwyn, Geraldine, Timaru, Caversham, Taieri, Tuapeka, Wallace, Invercargill, and Awarua—a majority of the votes polled was for no-license, but not in sufficient number to make up the three-fifths required to carry that issue. Of the total number of persons, 318,859, including those whose votes were informal, 180,294, or 56·54 per cent., were men, and 138,565, or 43·46 per cent., were women. Compared with the polling in the year 1899, this shows a numerical increase of 19,335, or 12·01 per cent., on the part of the men, and 17,702, or 14·65 per cent., on the part of the women, clearly showing that the latter are now taking greater interest in local-option matters than they formerly did.

A comparison with 1899 of the votes recorded and the number of persons who went to the poll, with the numerical and centesimal increase in each case, is shown in the next table :—

Year.	Number of Persons on Rolls.	Votes recorded for			Number of Persons who recorded Votes (including informal).		
		Continuance.	Reduction.	No License.	Males.	Females.	Totals.
1894 ..	248,194*	73,771	25,919	84,435	74,372	47,862	122,234
1896 ..	339,230	139,580	94,555	98,312	151,235	108,663	259,898
1899 ..	373,744	142,443	107,751	118,575	160,959	120,863	281,822
1902 ..	415,789	148,449	132,240	151,524	180,294	138,565	318,859

* Many had been struck off for not voting at the general election for Parliament.

The large increases in the number of votes recorded for no-license or reduction are prominent features in the above table. It is also interesting to note the substantial increase shown in the number of persons who went to the poll, though these latter must not be accepted as absolutely correct throughout.

SECTION XVII.—REPRESENTATION, AND THE GENERAL ELECTION OF 1902.

Representation.

The colony is at present (July, 1903) divided into sixty-eight districts for purposes of European representation—sixty-four rural districts having one member each, and four city electorates three members each. This division was made on the basis of the results of the census of 1901. The Electoral Act of 1902 directs that, in computing for electoral purposes the population of the colony, 28 per cent. shall be added to the country population—*i.e.*, all persons living outside towns of 2,000 inhabitants and over. The total population of the colony (other than Maoris), with the addition aforesaid, having been ascertained, is then divided by the number of members (76), and the quotient thus obtained forms the quota. The four city electoral districts (which have three members each) are so defined in extent that the population shall be three times the quota.* Inasmuch as it would be impossible to divide the country into a given number of districts all having exactly the precise quota of population, the law permits the Commissioners to make an allowance of 550 persons by way of addition to or deduction from the population of rural districts, and of 100 in case of city electorates, with special provision for districts where the population is partly city and partly rural, so that more consideration can be given to community of interest, facilities of communication, and topographical features, in constructing the districts.

But, although the above describes the existing state of affairs, the present electoral districts were formed in accordance with the laws in force prior to 2nd October, 1902, when the allowance by way of addition to or deduction from the population of rural districts was 1,250.

The Act provides for two permanent Commissions, called the "North" and "South" Island Representation Commissions. These sit together as a joint Commission for the purpose of fixing the number of districts for the North and South Islands respectively, but afterwards act separately and independently of one another, the duties and functions of each being confined to their respective island.

The North Island with its adjacent islands includes 34 electoral districts, having 38 members; the South and Stewart Islands having also 34 districts and 38 members. In 1896 and in 1899 the North Island returned 34 and the South Island 36 members; but

* "The City Single Electorates Act, 1903," provides that the existing electoral districts of City of Auckland, City of Wellington, City of Christchurch, and City of Dunedin shall each be divided into three electoral districts, returning one member for each division.

since then six new rural districts have been created, by which the North Island has gained four and the South Island two members.

These districts are, as before stated, for purposes of European representation. But the colony is again divided into four districts for purposes of Maori representation, under the electoral law, each district having one Native member elected by the Maoris; making the House of Representatives consist of 80 members altogether—76 Europeans and 4 Maoris.

The Electoral Law.

By the Act which came into force in 1893 the great step was taken of admitting women to the franchise. The Amendment Act of 1896 abolished the non-residential or property qualification, with a saving clause in favour of then-existing registrations in respect of such qualification. "The Electoral Act, 1902," consolidates the whole of the electoral laws, and amends the same where necessary.

Electors are enrolled on sending to the Registrar a claim and declaration according to a prescribed form. There are no fixed periods for making up fresh electoral rolls, but the rolls are revised and printed before a general election, and also for any district in which a by-election is to take place. Nor are there any fixed periods for the revising and purifying of the rolls. It is the duty of the Registrar of each electoral district to keep the rolls revised and complete.

The General Election of 1902.

For European Representatives.

[Polling-day, 25th November, 1902; number of polling-places, 1,879.]

Dealing with the population of both sexes, it is found that the total number of persons on the rolls was 415,789, out of a total adult population estimated at 429,385. These figures give a proportion of 96·83 per cent. of adults who were registered as electors, as against 96·79 at the previous election in 1899, 95·11 in 1896, and 94·98 in 1893. The number of persons who voted, or who went to the poll, was 318,859, or 76·69 per cent. of the number on the rolls, a slightly smaller proportion than obtained in 1899, which was 77·59 per cent.

Date of General Election.	Estimated Total Adult Persons.	Number on Rolls.	Proportion of Adult Persons registered as Electors.	Number of Persons who voted.	Proportion of Persons on Rolls who voted.
1893	319,010	302,997	94·98	220,082	75·25*
1896	356,658	339,230	95·11	258,254	76·13
1899	386,146	373,744	96·79	279,330	77·59*
1902	429,385	415,789	96·83	318,859†	76·69

* Excluding figures for three electorates in which there was no contest.
† Including 4,974 informal votes.

Dealing with men only, the number on the rolls was 229,845, or only 3,757 short of the full number of adult males in the colony as estimated for the day of the election. The males who voted in 1902 were 180,294, or 78·44 per cent. of those on the rolls, against 79·06 per cent. in 1899.

Date of General Election.	Estimated Total Adult Males.	Number of Men on Rolls.	Proportion of Adult Males registered as Electors	Number who voted.	Proportion of Males on Rolls who voted.
1893	179,539	193,536	†	129,792	69·61*
1896	197,002	196,925	99·96	149,471	75·90
1899	214,773	210,529	98·02	159,780	79·06*
1902	233,602	229,845	98·39	180,294‡	78·44

* Excluding figures for three electorates in which there was no contest.
† The number on the rolls was in excess of the estimated adult male population at the date of the election.
‡ Including informal.

The figures relating to women show that a lesser proportion (94·97 per cent.) of adults were registered as electors in 1902 than in 1899 (95·24 per cent.). The number of women who voted, 138,565, is 74·52 per cent. of the females on the rolls, while in 1899 there were 119,550 who voted, giving the higher proportion of 75·70 per cent.; so that (assuming the figures to be correct) there is no evidence of a greater willingness now on the part of the females to go to the poll.

Date of General Election.	Estimated Total Adult Females.	Number of Women on Rolls.	Proportion of Adult Females registered as Electors.	Number who voted.	Proportion of Females on Rolls who voted.
1893	139,471	109,461	78·48	90,290	85·18*
1896	159,656	142,305	89·13	108,783	76·44
1899	171,373	163,215	95·24	119,550	75·70*
1902	195,783	185,944	94·97	138,565†	74·52

* Excluding figures for three electorates in which there was no contest.
† Including informal.

The following table shows for the different districts the number of electors of each sex on the rolls, with the voters (including those whose votes were informal), and the population as at last census :—

Electoral Districts.	Number of Members.	Population as at Census, 31st March, 1901.	Number of Electors on Roll.			Number of Voters who recorded Votes (including informal).		
			Males.	Females.	Total.	Males.	Females.	Total.
Bay of Islands ..	1	8,372	2,430	1,586	4,016	1,753	1,052	2,805
Kaipara	1	9,519	3,099	1,635	4,734	2,309	1,270	3,579
Marsden	1	9,798	2,896	1,990	4,886	2,358	1,515	3,873
Waitemata ..	1	10,782	3,244	2,534	5,778	2,430	1,730	4,160
Eden	1	9,553	2,559	2,543	5,102	1,918	1,776	3,694
Auckland, City of ..	3	35,687	10,424	9,552	19,976	8,267	6,849	15,116
Grey Lynn ..	1	9,716	2,487	2,932	5,419	1,956	2,196	4,152
Parnell	1	10,511	2,980	3,208	6,188	2,030	1,919	3,949
Manukau ..	1	10,364	2,746	3,106	5,852	2,231	2,379	4,610
Franklin	1	9,523	2,766	2,085	4,851	2,089	1,346	3,435
Thames	1	10,708	2,820	2,681	5,501	2,275	1,967	4,242
Ohinemuri ..	1	9,834	3,453	1,828	5,281	2,527	1,367	3,894
Waikato	1	9,491	3,008	2,228	5,236	2,548	1,732	4,280
Bay of Plenty ..	1	10,897	4,045	1,683	5,728	2,815	1,596	4,411
Waiapu	1	9,905	3,930	2,351	6,281	3,139	1,835	4,974
Hawke's Bay ..	1	10,701	3,406	2,174	5,580	2,096	1,165	3,261
Napier	1	11,343	2,591	2,892	5,483	2,161	1,899	4,060
Waipawa	1	10,572	3,153	2,025	5,178	2,279	1,314	3,593
Pahiatua	1	9,444	2,755	1,863	4,618	2,201	1,354	3,555
Masterton	1	10,283	3,084	2,248	5,332	2,412	1,586	3,998
Wairarapa	1	8,408	2,861	1,889	4,750	2,465	1,609	4,074
Egmont	1	9,582	3,092	1,912	5,004	2,303	1,278	3,581
Taranaki	1	9,820	2,959	2,584	5,543	2,542	2,037	4,579
Hawera	1	10,132	3,347	2,430	5,777	2,669	1,834	4,503
Patea	1	10,568	3,948	2,439	6,387	3,034	1,832	4,866
Rangitikei ..	1	8,480	3,352	1,744	5,096	2,457	1,114	3,571
Wanganui ..	1	11,196	3,678	2,826	6,504	2,741	2,215	4,956
Oroua	1	9,435	2,816	1,899	4,715	1,782	1,461	3,243
Palmerston ..	1	10,555	3,450	2,666	6,116	2,638	2,028	4,666
Manawatu	1	9,057	2,752	1,726	4,478	2,014	1,238	3,252
Otaki	1	8,347	2,117	1,626	3,743	1,559	1,017	2,576
Hutt	1	10,451	2,775	2,289	5,064	2,157	1,763	3,920
Wellington, City of	3	35,836	11,063	10,155	21,218	8,669	7,312	15,981
Newtown ..	1	11,701	3,418	3,247	6,665	2,670	2,447	5,117
Nelson, City of ..	1	11,284	2,717	2,800	5,517	2,267	2,075	4,342
Motueka	1	9,872	2,703	1,757	4,460	1,796	907	2,703
Buller	1	10,747	3,355	2,076	5,431	2,665	1,487	4,152
Grey	1	10,255	3,415	2,096	5,511	2,297	1,154	3,451
Westland ..	1	8,662	2,862	1,806	4,668	2,124	1,153	3,277
Wairau	1	10,784	3,121	2,234	5,355	2,643	1,779	4,422
Hurunui	1	8,847	2,807	1,712	4,519	2,279	1,298	3,577
Kaiapoi	1	8,500	2,479	2,246	4,725	2,134	1,852	3,986
Avon	1	10,394	2,672	2,989	5,661	2,130	2,155	4,285
Christchurch, City of	3	35,826	9,663	10,106	19,769	8,367	8,458	16,825
Riccarton ..	1	8,475	1,922	2,409	4,331	1,404	1,908	3,312
Ellesmere ..	1	8,338	2,116	1,774	3,890	1,724	1,242	2,966
Lyttelton ..	1	10,465	2,502	2,364	4,866	1,960	1,982	3,942
Courtenay ..	1	8,430	2,335	1,892	4,227	1,801	1,352	3,153
Selwyn	1	9,231	2,608	1,731	4,339	2,017	1,222	3,239
Ashburton ..	1	10,497	3,422	2,454	5,876	2,772	1,962	4,734
Geraldine ..	1	8,787	2,387	1,918	4,305	2,058	1,575	3,633
Timaru	1	10,651	2,988	2,869	5,857	2,679	2,245	4,924

Electoral Districts.	Number of Members.	Population as at Census, 31st March, 1901.	Number of Electors on Roll.			Number of Voters who recorded Votes (including informal).		
			Males.	Females.	Total.	Males.	Females.	Total.
Waitaki	1	8,654	2,685	1,760	4,445	2,043	1,422	3,465
Oamaru	1	10,098	2,764	2,457	5,221	2,382	2,025	4,407
Mount Ida ..	1	8,361	2,721	1,575	4,296	2,174	1,180	3,354
Waikouaiti ..	1	8,912	2,324	2,009	4,333	1,767	1,336	3,103
Chalmers ..	1	10,945	3,016	3,015	6,031	2,345	2,324	4,669
Dunedin, City of ..	3	35,297	11,016	12,117	23,133	8,436	8,968	17,404
Caversham ..	1	11,533	3,100	3,242	6,342	2,727	2,808	5,535
Taieri	1	9,027	2,556	2,171	4,727	2,132	1,690	3,822
Bruce	1	8,405	2,686	2,185	4,871	2,103	1,826	3,929
Tuapeka	1	8,557	2,895	1,804	4,699	2,307	1,384	3,691
Clutha	1	9,481	2,827	2,147	4,974	2,245	1,476	3,721
Wakatipu ..	1	10,226	3,066	1,881	4,947	2,536	1,422	3,958
Mataura	1	10,710	3,524	2,531	6,055	2,943	2,016	4,959
Awarua	1	10,286	2,816	2,019	4,835	2,195	1,580	3,775
Invercargill ..	1	11,159	3,163	3,176	6,339	2,660	2,556	5,216
Wallace	1	10,237	3,108	2,046	5,154	2,688	1,714	4,402

Particulars are given for the four city electorates, where the electors have the right of voting for three members. The number of votes exercisable is more than twenty-eight thousand in excess of those recorded, so that some of the electors evidently voted for only one or two candidates. It is interesting to note, that for the two northern cities (Auckland and Wellington) in the number of electors on the rolls and the number who recorded their votes the males exceeded the females, while for the two city electorates in the South Island (Christchurch and Dunedin) the women voters outnumbered the men.

City.	No. of Members returned.	Electors on Rolls.			Voters who recorded Votes.			No. of Votes recorded.	No. of Votes exercisable by persons who voted.
		Men.	Women.	Total.	Men.	Women.	Total.		
Auckland ..	3	10,424	9,552	19,976	8,267	6,849	15,116	40,119	45,348
Wellington ..	3	11,063	10,155	21,218	8,669	7,312	15,981	42,365	47,943
Christchurch ..	3	9,663	10,106	19,769	8,367	8,458	16,825	45,056	50,475
Dunedin ..	3	11,016	12,117	23,133	8,436	8,968	17,404	39,567	52,212
Totals ..	12	42,166	41,930	84,096	33,739	31,587	65,326	167,107	195,978

A return is added showing the number of votes recorded for each candidate, and from this it will be seen that in thirteen instances the deposits were forfeited, the number of votes received in each

case having been less than one-tenth of the number polled by the successful candidate. One candidate, Mr. F. W. Isitt, was nominated for ten separate districts, and one, Mr. D. Whyte, for two districts :—

Electoral Districts and Names of Candidates.	Number of Votes recorded. For each Candidate.	Total.
Bay of Islands :		
Houston, R. M.	1,593	
Glass, A. G. C.	1,183	2,776
Kaipara :		
Harding, A. E.	1,183	
Stallworthy, J.	824	
Peacocke, G. L.	730	
Bassett, T.	529	
Newman, C.	288	3,554
Marsden :		
Mander, F.	1,951	
Thompson, R.	1,893	3,844
Waitemata :		
Alison, E. W.	2,409	
Hatfield, A. J.	1,695	4,104
Eden :		
Bollard, J.	2,628	
Cheal, P. E.	1,000	3,628
City of Auckland :		
Witheford, J. H.	7,854	
Baume, F. E.	7,540	
Kidd, A.	5,786	
Richardson, W.	4,852	
Napier, W. J.	4,271	
Rosser, A.	3,504	
French, R.	3,055	
Hanan, J. H.	2,016	
Fawcus, J.	966	
Bradly, A. P.	217	
Simson, H. N.	58	40,119
Grey Lynn :		
Fowlds, G.	2,108	
Masefield, T. T.	1,990	4,098
Parnell :		
Lawry, F.	1,996	
Shera, J. M.	1,872	3,868
Manukau :		
Kirkbride, M. M.	2,372	
O'Rorke, Sir G. M.	2,145	4,517
Franklin :		
Massey, W. F.	2,297	
Harris, A. R.	1,121	3,418

Electoral Districts and Names of Candidates.	Number of Votes recorded. For each Candidate.	Total.
Thames :		
McGowan, J.	2,458	
Lucas, W. H.	1,573	
Isitt, F. W.	36	4,067
Ohinemuri :		
Moss, E. G. B.	1,527	
Palmer, J.	1,341	
Poland, H.	996	3,864
Waikato :		
Lang, F. W.	2,234	
Greenslade, H. J.	2,009	4,243
Bay of Plenty :		
Herries, W. H.	2,110	
Lundon, D.	1,434	
Jordan, C.	429	
Taylor, J. E.	387	4,360
Waiapu :		
Carroll, J.	3,232	
Isitt, F. W.	1,562	4,794
Hawke's Bay :		
Russell, Sir W. R.	2,330	
Isitt, F. W.	887	3,217
Napier :		
Fraser, A. L. D.	2,739	
Eames, R. J.	1,249	3,988
Waipawa :		
Hall, C.	2,556	
Taylor, J.	988	3,544
Pahiatua :		
O'Meara, J.*	1,796	
Bolton, S.	1,459	
Gould, A. W.	268	3,523
Masterton :		
Hogg, A. W.	2,451	
Cooper, J. C.	1,503	3,954
Wairarapa:		
Buchanan, W. C.	2,049	
Hornsby, J. T. M.	1,983	4,032

* Deceased. W. H. Hawkins elected 28th July, 1904.

Electoral Districts and Names of Candidates.	Number of Votes recorded. For each Candidate.	Total.
Egmont:		
Jennings, W. T.	1,765	
Leech, C.	1,750	3,515
Taranaki:		
Smith, E. M.	2,419	
Okey, H. J. H.	2,105	4,524
Hawera:		
Major, C. E.	2,233	
McGuire, F.	2,212	4,445
Patea:		
Symes, W.	2,638	
Haselden, F. H.	2,187	4,825
Rangitikei:		
Remington, A. E.	1,399	
Birch, W. J.	1,152	
Reardon, M. J.	537	
Hornblow, R. E.	358	
Smith, J.	69	3,515
Wanganui:		
Willis, A. D.	2,866	
Baker, J. W.	1,428	
Lundon, G.	586	4,880
Oroua:		
Lethbridge, F. Y.	1,911	
Tompkins, A. H.	1,293	3,204
Palmerston:		
Wood, W. T.	2,230	
Hodder, T. R.	1,896	
Manson, H. J.	511	4,637
Manawatu:		
Vile, J.	1,691	
Stevens, J.	1,515	3,206
Otaki:		
Field, W. H.	2,006	
Isitt, F. W.	496	2,502
Hutt:		
Wilford, T. M.	2,115	
Pirani, F.	1,674	
Collier, J. H.	90	3,879
City of Wellington:		
Aitken, J. G. W.	7,808	
Duthie, J.	6,886	
Fisher, G.	6,685	
O'Regan, P. J.	6,304	
Atkinson, A. R.	6,094	
Findlay, J. G.	4,764	
Godber, J.	1,437	
Jellicoe, E. G.	1,384	
McLaren, D.	1,003	42,365

Electoral Districts and Names of Candidates.	Number of Votes recorded. For each Candidate.	Total,
Newtown:		
Barber, W. H. P.	1,385	
Hislop, T. W.	1,357	
Luke, C. M.	1,100	
Chapple, W. A.	1,017	
Tustin, W. G.	159	5,018
City of Nelson:		
Graham, J.	2,156	
Atmore, H.	1,633	
Piper, J.	521	4,310
Motueka:		
McKenzie, R.	2,256	
Isitt, F. W.	418	,674
Buller:		
Colvin, J.	3,370	
Isitt, F. W.	769	4,139
Grey:		
Guinness, A. R.	2,764	
Isitt, F. W.	619	3,383
Westland:		
Seddon, Rt. Hon. R. J.	2,983	
Isitt, F. W.	237	3,220
Wairau:		
Mills, C. H.	2,401	
Duncan, J.	1,990	4,391
Hurunui:		
Rutherford, A. W.	1,577	
Reece, H. F.	880	
Meredith, R.	834	
Forbes, G. W.	205	
Pulley, G. T.	68	3,564
Kaiapoi:		
Buddo, D.	2,558	
Hassall, A. D.	1,302	3,860
Avon:		
Tanner, W. W.	1,680	
Brunt, J. R.	1,632	
Loughrey, A.	871	
Myers, J. S.	37	4,220
City of Christchurch:		
Taylor, T. E.	8,122	
Ell, H. G.	7,924	
Davey, T. H.	6,331	
Collins, W. W.	5,982	
Smith, G. J.	5,980	
Turnbull, A. H.	4,648	
Taylor, C.	4,491	
Allison, C.	1,393	
Baynes, B.	185	45,056

Electoral Districts and Names of Candidates.	Number of Votes recorded. For each Candidate.	Total.
Riccarton:		
Witty, G. ..	1,776	
Russell, G. W.	1,491	3,267
Ellesmere:		
Rhodes, R. H.	1,719	
Thornton, C. R.	1,218	2,937
Lyttelton:		
Laurenson, G.	3,041	
Rollitt, W. ..	869	3,910
Courtenay:		
Lewis, C. ..	1,535	
Rennie, J. ..	1,185	
Barrett, J. ..	401	3,121
Selwyn:		
Hardy, C. A. C.	1,594	
Ivess, J. ..	1,051	
Wilson, K. ..	554	3,199
Ashburton:		
McLachlan, J.	2,132	
Studholme, J., jun.	1,693	
Brock, W. ..	783	
Ager, A. ..	60	4,668
Geraldine:		
Flatman, F. R.	2,275	
Maslin, W. S.	1,303	3,578
Timaru:		
Hall-Jones, W.	3,046	
Smith, F. H.	1,395	
Isitt, F. W.	348	4,789
Waitaki:		
Steward, Sir W. J.	1,992	
Campbell, J.	1,400	3,392
Oamaru:		
Duncan, T. Y.	2,141	
Brown, J. M.	1,261	
Macpherson, J. A.	717	
Crawford, H. B.	138	4,257
Mount Ida:		
Herdman, A. L.	1,731	
Ewing, J. ..	1,600	3,331
Waikouaiti:		
Mackenzie, T.	2,424	
Isitt, F. W.	578	3,002

Electoral Districts and Names of Candidates.	Number of Votes recorded. For each Candidate.	Total.
Chalmers:		
Allen, E. G.	2,614	
White, J. ..	2,002	4,616
City of Dunedin:		
Bedford, H. D.	10,088	
Millar, J. A.	9,396	
Arnold, J. F.	8,393	
Barclay, A. R.	7,072	
Chisholm, R.	4,618	39,567
Caversham:		
Sidey, T. K.	2,939	
Earnshaw, W.	2,495	5,434
Taieri:		
Reid, D., jun.	1,503	
Ramsay, J. J.	1,149	
Marshall, A.	589	
Samson, C. ..	407	
Wright, J. ..	134	3,782
Bruce:		
Allen, J. ..	2,505	
Scott, J. A. ..	1,392	3,897
Tuapeka:		
Bennet, J. ..	1,864	
Gilkison, R.	1,798	3,662
Clutha:		
Thomson, J. W.	1,671	
Stewart, D. ..	1,031	
Quin, W. ..	820	
McNeil, J. ..	176	3,698
Wakatipu:		
Fraser, W. ..	1,971	
Ross, R. B. ..	1,522	
Murdoch, A.	324	
Kelly, J. ..	65	3,882
Mataura:		
McNab, R. ..	2,669	
Raymond, I. W.	2,231	4,900
Awarua:		
Ward, Sir J. G.	2,795	
Whyte, D. ..	913	3,708
Invercargill:		
Hanan, J. A.	3,322	
Whyte, D. ..	1,814	5,136
Wallace:		
Thomson, J. C.	2,589	
Glifedder, M.	1,796	4,385

A summary of the population, number of electors on the rolls, and the total number of votes recorded at each of the last four general elections is next given :—

—	1902.	1899.	1896.	1893.
Number of votes recorded for members elected	235,083	202,324	184,929	153,663
Number of votes recorded for defeated candidates	181,879	185,305	174,475	149,413
Total votes recorded* ..	416,962	387,629	359,404	303,076
Number of names on rolls in districts uncontested	..	13,726	..	10,539
Number of names on rolls in districts where elections were contested	415,789	360,018	339,230	292,458
Total number of electors on rolls	415,789	373,744	339,230	302,997
Total population at last census	772,504	703,119	703,119	626,359

* Total number of electors who recorded their votes: 318,859 in 1902, 279,330 in 1899, 258,254 in 1896, and 220,082 in 1893.

The names of the members returned at the last general election arranged in alphabetical order are next shown, with the electoral district represented by each.

Name.	Electoral District.
Aitken, John Guthrie Wood	City of Wellington.
Alison, Ewen William	Waitemata.
Allen, Edmund Giblett	Chalmers.
Allen, James	Bruce.
Arnold, James Frederick	City of Dunedin.
Barber, William Henry Peter	Newtown.
Baume, Frederick Ehrenfried	City of Auckland.
Bedford, Harry Dodgshun	City of Dunedin.
Bennet, James	Tuapeka.
Bollard, John	Eden.
Buchanan, Walter Clark	Wairarapa.
Buddo, David	Kaiapoi.
Carroll, Hon. James	Waiapu.
Colvin, James	Buller.
Davey, Thomas Henry	City of Christchurch.
Duncan, Hon. Thomas Young	Oamaru.
Duthie, John	City of Wellington.
Ell, Henry George	City of Christchurch.
Field, William Hughes	Otaki.
Fisher, George	City of Wellington.
Flatman, Frederick Robert	Geraldine.
Fowlds, George	Grey Lynn.
Fraser, Alfred Levavasour Durell	Napier.
Fraser, William	Wakatipu.
Graham, John	Nelson.
Guinness, Arthur Robert	Grey.

Name.	Electoral District.
Hall, Charles	Waipawa.
Hall-Jones, Hon. William	Timaru.
Hanan, Josiah Alfred	Invercargill.
Harding, Alfred Ernest	Kaipara.
Hardy, Charles Albert Creery	Selwyn.
Herdman, Alexander Laurence	Mount Ida.
Herries, William Herbert	Bay of Plenty.
Hogg, Alexander Wilson	Masterton.
Houston, Robert Morrow	Bay of Islands.
Jennings, William Thomas	Egmont.
Kidd, Alfred	City of Auckland.
Kirkbride, Matthew Middlewood	Manukau.
Lang, Frederic William	Waikato.
Laurenson, George	Lyttelton.
Lawry, Frank	Parnell.
Lethbridge, Frank Yates	Oroua.
Lewis, Charles	Courtenay.
McGowan, Hon. James	Thames
McKenzie, Roderick	Motueka.
Mackenzie, Thomas	Waikouaiti.
McLachlan, John	Ashburton.
McNab, Robert	Mataura.
Major, Charles Edwin	Hawera.
Mander, Francis	Marsden.
Massey, William Ferguson	Franklin.
Millar, John Andrew	City of Dunedin.
Mills, Hon. Charles Houghton	Wairau.
Moss, Edward George Britton	Ohinemuri.
O'Meara, John*	Pahiatua.
Reid, Donald (jun.)	Taieri.
Remington, Arthur Edward	Rangitikei.
Rhodes, Robert Heaton	Ellesmere.
Russell, Sir William Russell, K.C.M.G.	Hawke's Bay.
Rutherford, Andrew William	Hurunui.
Seddon, Rt. Hon. Richard John, P.C.	Westland.
Sidey, Thomas Kay	Caversham.
Smith, Edward Metcalf	Taranaki.
Steward, Sir William Jukes, K.C.M.G.	Waitaki.
Symes, Walter	Patea.
Tanner, William Wilcox	Avon.
Taylor, Thomas Edward	City of Christchurch.
Thomson, James William	Clutha.
Thomson, John Charles	Wallace.
Vile, Job	Manawatu.
Ward, Hon. Sir Joseph George, K.C.M.G. ..	Awarua.
Wilford, Thomas Mason	Hutt.
Willis, Archibald Dudingston	Wanganui.
Witheford, Joseph Howard	City of Auckland.
Witty, George	Riccarton.
Wood, William Thomas	Palmerston.

* Since deceased; and William Henry Hawkins, Esq., elected.

Occupations of Members of House of Representatives.

The occupations of members elected in 1902 show an increase in the number of the representatives of the farmer class as com-

pared with 1899. The table also shows that farmers or runholders furnish more members than any other class of occupation. There were twenty-one of these (besides four given as "settlers") returned in 1902. There were ten barristers or solicitors, and five journalists. The number of members returned in 1902 was seventy-six, against seventy in 1896 and 1899 :—

Occupations.	1896.	1899.	1902.
Professional—			
Barrister, solicitor	5	9	10
Journalist	9	8	5
Mining advocate, interpreter, lecturer, teacher ..	3	4	1
Chemist	..	..	1
Domestic—			
Hotelkeeper	..	..	1
Commercial—			
Land-broker, estate agent	..	..	2
Auctioneer	1	1	2
Director of financial company	..	1	1
Native agent	..	1	1
Stationer, bookseller, draper, grocer, butcher ..	3	6	5
Merchant, iron-merchant, timber-merchant ..	3	2	4
Storekeeper	1	2	2
Commission agent, clerk, accountant, commercial traveller	3	2	3
Transport and Communication—			
Coach-proprietor	..	..	1
Industrial—			
Tailor, shoemaker, dyer	2	2	3
Mill-owner, ship-rigger, builder, metallurgical engineer, mine-manager	4	2	2
Blacksmith	..	..	1
Printer	..	..	2
Farmer	11	13	12
Sheep-farmer, runholder, grazier, stock-owner ..	14	7	9
Contractor	3	3	3
Others—			
Settler, gentleman, &c.	8	7	5

For Maori Representatives.

(Polling-day, 22nd December, 1902.)

Of a Maori population amounting to 43,143 persons at the census of 1901, 14,271 voted at the general election held in December, 1902, an increase of 643 on the number who voted at the election of 1899. In 1893 the voters numbered 11,269, or 1,739 persons fewer than in 1896, when 13,008 Maoris recorded their votes, while at the general election held in December, 1899, the number of Maoris who voted was 13,628. As the Native population increased

but slightly between 1891 and 1901, it would appear that Maoris are taking more interest as to their representation in Parliament than formerly, or perhaps there is now more convenience for attending to vote, or better knowledge of political affairs. The numbers of voters for the several districts in December, 1902, were :—

Electoral Districts.	Population: Census 1901.			Number who voted.	Per Cent. of Population at all Ages.
	Males.	Females.	Totals.		
North Island—					
Northern Maori ..	5,400	4,478	9,878	2,134	21·60
Eastern Maori ..	7,465	6,510	13,975	5,265	37·67
Western Maori ..	9,054	7,994	17,048	6,266	36·76
South Island—					
Southern Maori ..	1,193	1,049	2,242	606	27·03
Totals ..	23,112	20,031	43,143	14,271	33·08

The votes recorded for each candidate were :—

Electoral Districts and Names of Candidates.	Number of Votes recorded.	
	For each Candidate.	Total.
Northern Maori Electoral District :		
Hone Heke ..	1,665	
Hamiora Mangakahia	268	
Kipa te Whatanui ..	119	
Hapeta Henare ..	74	
Eru Ihaka	8	2,134
Eastern Maori Electoral District :		
Wiremu Pere ..	2,182	
Pirimi Mataiawhea ..	1,568	
Mohi te Atahikoia ..	1,515	5,265
Western Maori Electoral District :		
Henare Kaihau ..	3,324	
Ngarangi Katitia ..	954	
Te Heuheu Tukino ..	840	
Eruera te Kahu ..	673	
Te One Tuhi ..	399	
Te Weraroa Kingi ..	76	6,266
Southern Maori Electoral District :		
Tame Parata ..	343	
Hone Tare Tikao ..	263	606
Total		14,271

On the succeeding page will be found a tabular statement giving the results of each general election since the year 1853 for purposes of European representation.

GENERAL ELECTIONS FOR EUROPEAN REPRESENTATIVES HELD FROM THE YEAR 1853.

Parliament	Date of General Election.	Number of Names on Roll of Electors.	Number of Members returned.	Number of Members returned unopposed.	Numbers of Votes recorded (or of Voters recording Votes).	Population of the Colony at end of Year.	Average Number of		
							Persons to each Member.	Persons to each Elector.	Electors to each Member.
First	1853	[1] 5,934	37	*	*	30,000	811	5·1	160
Second ..	1855	[2] 10,324	37	*	*	37,192	1,005	3·6	279
Third	1861	13,466	53	*	*	79,711	1,504	5·9	254
Fourth ..	1866	[3] 33,338	72	*	*	190,607	2,647	5·7	463
Fifth	1871	47,275	74	*	*	248,400	3,357	5·3	639
Sixth	1875	61,755	84	*	*	375,856	4,474	6·1	735
Seventh ..	1879	82,271	84	14	43,776	463,729	5,521	5·6	979
Eighth ..	1881	120,972	91	11	69,985	500,910	5,505	4·1	1,329
Ninth	1884	137,686	91	11	74,672	564,304	6,201	4·1	1,513
Tenth	1887	175,410	91	5	111,911	603,361	6,630	3·4	1,928
Eleventh ..	1890	183,171	70	6	136,337	625,508	8,936	3·4	2,617
Twelfth ..	1893	[4]302,997	70	3	[4 5]220,082	672,265	9,604	2·2	4,328
Thirteenth ..	1896	[4]339,230	70	..	[4 5]258,254	714,162	10,202	2·1	4,853
Fourteenth ..	1899	[4]373,744	70	3	[4 5]279,330	756,505	10,807	2·0	5,339
Fifteenth ..	1902	[4]415,789	76	..	[4 5]318,859	807,929	10,631	1·9	5,471

* Information not obtainable.

[1] Including 100, the estimated number in Akaroa District, for which there is no return.
[2] Including 800, the estimated number in the electorates of Town of New Plymouth, Grey, and Bell, and Omata, for which districts there are no returns.
[3] Electors for the Electoral District of "The Otago Goldfields" not included.
[4] Men and women.
[5] Voters recording votes.

SECTION XVIII.—FINANCE.

Subsection A.—Revenue and Expenditure of the General Government.

The revenue proper for the year ended 31st March, 1904, amounted to £7,021,386, and other receipts were £108,731, including £60,600 as the proceeds of sinking-fund debentures. The total receipts were thus £7,130,117. The principal increases over the previous year were in the Customs duties, £265,682; stamps, £100,345; land and income tax, £59,617; and railways, £185,442. All the other heads of revenue exceeded the previous year's receipts, except the territorial revenue, which fell off to the amount of £4,435.

The expenditure for the year under permanent charges and votes reached £6,434,281, or £220,263 in excess of that for the previous year. Amongst the permanent charges interest and sinking fund shows an increase of £57,000 over the previous year, arising from the payment of interest on new loans issued. The amount transferred to the Public Works Fund during the year was £350,000, making the total expenditure out of the Consolidated Fund £6,784,281.

Summarising the above results it is found that the balance of receipts over expenditure for the year amounted to £345,836. To this must be added the amount brought forward from the previous year, £303,905; and the total, £649,741, represents the balance carried forward for the current financial year's operations.

The chief heads of revenue and expenditure are shown hereunder:—

REVENUE AND EXPENDITURE.

Revenue.	£	£	*Expenditure.*	£	£
Balance on 31st March, 1903		303,906	His Excellency the Governor	7,000	
Customs duties	2,601,325		Legislative	57,915	
Beer duty	96,721		Ministers' salaries and allowances	12,416	
Stamps (including postal and telegraph cash receipts)	1,079,284		Interest and sinking fund charges	1,957,963	
Land-tax	334,991		Exchange and commission	27,126	
Income-tax	221,369		Pensions, civil and military	65,629	
Railways	2,167,992		Old-age pensions	204,500	
Registration and other fees	92,647		Railways	1,451,954	
Marine dues	35,836		Public instruction	588,860	
Miscellaneous	143,379		Postal and telegraph services	524,500	
Territorial revenue	247,842		Judicial and legal	265,789	
	7,021,386		Hospitals and charitable institutions	103,262	
Other receipts—			Defence	165,142	
Proceeds of debentures for increases of sinking fund	60,600		Subsidies to local bodies	70,548	
Recoveries in respect of expenditure of previous years	48,131		Department of Agriculture	112,447	
	108,731		Lunatic asylums	68,601	
			Valuation Department	27,971	
			Customs	37,713	
			Marine (including harbours and lights)	42,703	
			Printing and stationery	41,339	
			Land and Income Tax Department	19,923	
			Registration of land and deeds, births, deaths, and marriages	22,363	
			Public buildings and domains	22,840	
			Public Health Department	32,936	
			Industries and Commerce	36,494	
			Tourist Department	21,151	
			Miscellaneous expenditure	170,160	
			Territorial expenditure	275,036	
					6,434,281
			Other expenditure—		
			Transferred to Public Works Fund		350,000
			Balance on 31st March, 1904		649,741
	£7,434,022				£7,434,022

Ordinary Revenue.

The ordinary revenue shows an increase for the year 1903–1904 of 10·42 per cent. over the figures for 1902–1903. When considering the figures given it must be remembered that population increased at the rate of 2·96 per cent., so that any rate above this means a higher ratio of revenue. Taking the items in order of their magnitude, the advance is shown below :—

Heads of Revenue.	Ordinary Revenue.				Increase.	
	1903–1904.	Per Cent. of Total.	1902–1903.	Per Cent. of Total.	Numerical.	Centesimal.
	£		£		£	Per Cent.
Customs duties	2,601,325	38·40	2,335,643	38·07	265,682	11·38
Railways...	2,167,992	32·01	1,982,551	32·32	185,441	9·35
Stamps (including postal and telegraph cash receipts)	1,079,284	15·93	978,939	15·96	100,345	10·25
Land-tax...	334,991	4·94	296,062	4·83	38,929	13·15
ncome-tax	221,369	3·27	200,684	3·27	20,685	10·31
Beer duty	96,721	1·43	90,400	1·47	6,321	6·99
Registration and other fees	92,647	1·37	83,881	1·37	8,766	10·45
Marine	35,836	0·53	32,968	0·54	2,868	8·70
Miscellaneous	143,379	2·12	133,204	2·17	10,175	7·64
Ordinary revenue...	6,773,544	100·00	6,134 332	100·00	639,212	10·42

The amount derived from Customs duties was 11·38 per cent. greater than that shown for 1902–1903; beer duty, 6·99 per cent.; income-tax, 10·31 per cent.; stamps, &c., 10·25 per cent.; and railway revenue shows an advance of 9·35 per cent. While the mean population of the colony increased by 2·96 per cent. during 1903–1904, the ordinary revenue advanced at the much higher rate of 10·42 per cent., as shown above.

The Customs and excise duties in 1903–1904 accounted for £39 16s. 7d. out of every £100 of ordinary revenue collected; railways, £32 0s. 2d.; and stamps, &c., £15 18s. 7d. Of other items, the land-tax yielded 4·94 per cent. and income-tax 3·27 per cent. of the revenue

Territorial Revenue.

Territorial revenue belonging to the Consolidated Fund decreased from £252,277 in 1902–1903 to £247,842 in 1903–1904, or at the rate of 1·76 per cent. In the previous year, 1902–1903, there was an increase of 1·06 per cent. Details for the last two years are:—

—	Territorial Revenue.				Increase or Decrease, 1903–1904.	
	1903–1904.	Per Cent. of Total.	1902–1903.	Per Cent. of Total.	Numerical.	Centesimal.
	£		£		£	Per Cent.
Cash land sales	50,566	20·40	37,446	14·84	+ 13,120	+ 35·03
Deferred-payment land sales	5,505	2·22	6,702	2·66	− 1,197	− 17·86
Pastoral runs, rents, miscellaneous	191,771	77·38	208,129	82·50	− 16,358	− 7·86
Territorial revenue	247,842	100·00	252,277*	100·00	− 4,435	− 1·76

* Exclusive of revenue derived from land set apart for State forests, £16,726; lands for close settlement, £150,407; and of the Cheviot Estate, £13,780. These moneys are credited in the separate *loan* accounts to which they belong. The amount of all moneys taken by the Receivers of Land Revenue during the year ended 31st March, 1904, will be found stated, under each head, in Section XIX., "Crown Lands."

By the foregoing table the cash land sales for 1903–1904 are shown to have increased by 35 per cent., and to supply more than 20 per cent. of the whole territorial revenue of the Consolidated Fund; while rents and miscellaneous, which constitute over 77 per cent. of the total, have decreased by nearly 8 per cent.

Ordinary and Territorial Revenue.

The total ordinary and territorial revenue is found to have increased from £6,386,609 in 1902–1903 to £7,021,386 in 1903–1904, or at the rate of 9·94 per cent., or 6·98 per cent. more than the rate at which population increased :—

	Ordinary. £	Territorial. £	Total. £
Year 1902–1903	6,134,332	252,277	6,386,609
„ 1903–1904	6,773,544	247,842	7,021,386
Increase ..	639,212	−4,435	634,777

After allowing for alteration in system of charging interest and sinking fund, the charges of the public debt paid out of the Consolidated Fund, in proportion to the ordinary and territorial revenue, are found to have fallen from 41·6 per cent. in 1890–91 to 27·89 per cent. in 1903–1904.

If the sum of £56,071, the amount of territorial revenue received by way of land sales in 1903–1904, is deducted from the total revenue the charges of the public debt will be found to have absorbed 28·11 per cent. of the revenue, reduced by the sum derived from relinquishment of real estate of the Crown.

Total Revenue of General Government.

The whole of the revenue of the General Government arising from taxation as well as from other sources for the last nine financial

years exhibits great progress. The rates of taxation and of revenue per head of mean population are given to illustrate this :—

Year ended 31 March.	Revenue.			Taxation per Head of Mean Population.	Revenue per Head of Mean Population.
	From Taxation.	From other Sources.	Total.		
	£	£	£	£ s. d.	£ s. d.
1896	2,335,760	2,220,255	4,556,015	3 7 1	6 10 10
1897	2,521,911	2,276,797	4,798,708	3 11 0	6 15 1
1898	2,678,576	2,400,654	5,079,230	3 13 11	7 0 2
1899	2,707,099	2,551,129	5,258,228	3 13 3	7 2 3
1900	2,891,126	2,808,492	5,699,618	3 16 10	7 11 6
1901	3,042,890	2,864,026	5,906,916	3 19 6	7 14 4
1902	3,113,079	3,039,760	6,152,839	3 19 8	7 17 6
1903	3,277,964	3,169,471	6,447,435	4 1 8	8 0 8
1904	3,649,601	3,480,516	7,130,117	4 8 4	8 12 5

The total revenue is shown to have increased from £4,556,015 in 1895–96 to £7,130,117 in 1903–1904, a difference of £2,574,102, while the proportion to population has increased by no less than £2 1s. 7d. per head.

The greater yield from the sources of taxation exhibited by the above figures may be regarded as indicative of increased prosperity enjoyed by the people of the colony.

Ordinary Revenue Expenditure.

The expenditure for 1903–1904 (exclusive of expenditure properly belonging to territorial purposes) amounted to £6,434,281, of which the largest item, after the charges of the public debt, £1,957,963, was on account of railways, £1,451,954. Public instruction cost £588,860, of which £450,708 was for carrying on the Board schools, £30,712 for technical and higher education, £19,706 for Native schools, £20,178 for industrial schools, and £29,526 for school-buildings. The postal and telegraph services cost £524,500. Under the heading "Judicial and Legal" the total sum expended was £265,789, of which the largest item was the police, £126,149; the next, District and Magistrates' Courts, £48,639; and, thirdly, prisons, £34,976. Hospitals and charitable institutions cost £103,262, and the lunatic asylums £68,601. Defence required £165,142, exclusive of £13,366 contributed by the colony towards the cost of Australasian naval defence; the Department of Agriculture, £112,447; Public Health Department, £32,936; Industries and Commerce Department, £36,494; Tourist Department, £21,151; and the Valuation Department, £27,971. Payments of old-age pensions required £204,500 for the year.

Territorial Revenue Expenditure.

The chief items of expenditure under this head are the Lands and Survey Department, £160,932, and Mines, £9,785; while there was paid to local bodies £98,190 (£33,354 being "thirds" and "fourths" under the Land Act, and £15,662 for the Greymouth, £3,210 for the New Plymouth, £44,510 for the Westport, and £1,454 for the Nelson Harbour Boards); besides £5,427 expended in management of water-races, and £702 in rates on Crown lands.

Ordinary and Territorial Revenue Expenditure: Five Years.

The expenditure out of ordinary and territorial revenue during the last five financial years is tabulated, specifying the chief heads of expenditure. It must be noted that the old-age pensions become a large item for 1899–1900 and following years. The development of the Departments of Agriculture, Public Health, &c., also contributed to raising the expenditure latterly:—

Expenditure.	Financial Years (ended 31st March).				
	1899–1900.	1900–1901.	1901–1902.	1902–1903.	1903–1904.
	£	£	£	£	£
Charges of the public debt ..	1,749,394	1,745,616	1,803,939	1,900,979	1,957,963
Railways ..	1,039,412	1,145,088	1,280,997	1,357,385	1,451,954
Public instruction (including school-buildings, industrial and Native schools, and deaf-and-dumb institution)	472,653	481,087	539,317	566,568	588,860
Postal and telegraph ..	388,582	416,364	463,817	485,860	524,500
Militia and Volunteers	162,940	229,704	191,250	214,226	165,142
Old-age pensions	157,095	199,708	210,045	212,962	204,500
Crown lands and surveys ..	123,441	137,838	122,278	129,795	160,932
Police	115,752	117,744	120,629	123,804	126,149
Other expenditure	930,858	1,006,555	1,163,643	1,222,440	1,254,281
Totals ..	5,140,127	5,479,704	5,895,915	6,214,019	6,434,281

State Forests Account.

The receipts during the year were £16,726, and the balance brought forward £31,530, making a total of £48,256. The expendi- for the year amounted to £15,584, leaving a balance on 31st March last of £32,672.

Loan Accounts, Receipts and Expenditure, 1903–1904.

The total receipts of the various loan accounts—excluding the operations of the Government Advances to Settlers Office, the Conversion Account, and New Zealand Consols Account—for the year ended 31st March, 1904, were :—

	£	£
Receipts :—		
Public Works Fund—		
The Aid to Public Works and Land Settlement Acts—		
Balance of loan issued under Act of 1902 ..	740,000	
Debentures issued under Act of 1903 (colonial issue)	583,950	
Interest and premium	29	
		1,323,979
Transfer from Consolidated Fund	350,000	
Amount received for purchase of debentures under "The Paeroa-Waihi Railway Act, 1903" ..	50,000	
Debentures created under The Midland Railway Petitions Settlements Acts, 1902, 1903..	150,000	
		550,000
Ellesmere Reclamation, &c., Account	..	1,635
		1,875,614
Cheviot Estate Account—		
Receipts under "The Cheviot Estate Disposition Act, 1893"	..	13,780
State Coal-mines Account—		
Debentures	55,000	
Proceeds of sale of coal	1,703	
		56,703
Land for Settlements Account—		
Debentures	511,350	
Rents and license fees, &c.	164,502	
		675,852
Loans to Local Bodies Account—		
Debentures	205,000	
Recoveries	665	
		205,665
		2,827,614
Debentures issued under the Aid to Public Works and Land Settlement Acts, in London, for renewal of a like amount (as per contra)	..	465,000
		£3,292,614

The total expenditure out of the above accounts during the financial year was £2,715,627, excluding £465,000 for payment of debentures falling due.

Disbursements out of the Public Works Fund totalled £1,796,841, including debentures for £150,000 issued to the Midland Railway bondholders by way of settlement of all claims. The Colonial Treasurer proposes to transfer to this account during the current year a substantial sum out of the Consolidated Fund, in addition to the amounts already received from that source in past years (£3,755,000).

The Land for Settlements Account shows that payments were made during the year for the purchase of estates to be cut up for close settlement, £468,616; incidental expenses, £39,565; while the interest charge on the Consolidated Fund was relieved to the extent of £115,088 out of this account.

The Loans to Local Bodies Account, which deals with moneys used chiefly for roading the more inaccessible country and for water-supply, shows an expenditure amounting to £195,652, besides that to open up Crown lands, £25,753.

Working and other expenses of the State coal-mines totalled £63,174, and debenture interest £2,072. The only payment out of the Cheviot Estate Account during the year was for interest £8,866.

Expenditure:—	£	£
Public Works Fund—		
Railways	828,704	
Roads	361,842	
Public buildings	216,192	
Contingent defence	38,724	
Development of goldfields	16,278	
Tourist and health resorts	15,643	
Lighthouses, harbour-works, and harbour-defences	10,863	
Telegraph extension	47,227	
Purchase of Native lands	5,352	
Lands improvement	2,019	
Rates on Native lands	666	
Public Works departmental	16,089	
Charges and expenses of raising loans	87,249	
Immigration	*Cr.* 7	
Debentures issued under the Midland Railway Petitions Settlement Acts	150,000	
		1,796,841
Land for Settlements Account—		
Purchase of estates	468,616	
Charges and expenses	39,565	
Interest	115,088	
		623,269
Loans to Local Bodies Account—		
Grants to local bodies	195,652	
Roads to open up Crown lands	25,753	
		221,405
State Coal-mines Account—		
Working-expenses and other charges	63,174	
Interest on debentures	2,072	
		65,246
Cheviot Estate Account—		
Interest		8,866
Total		2,715,627
Aid to Public Works and Land Settlement Acts—		
Debentures paid off		465,000
		£3,180,627

The expenditure out of loan accounts for five years may be summarised as given in the next table :—

Heads of Expenditure out of Loan Accounts.	Financial Years.				
	1899-1900.	1900-1901.	1901-1902.	1902-1903.	1903-1904.
	£	£	£	£	£
Charges and expenses of raising loans	28,322	1,460	5,620	88,180	87,249
Cheviot Estate purchase and expenses	8,917	8,937	8,881	9,037	8,866
Contingent defence ..	42,810	37,650	146,876	37,004	38,724
Immigration	385	214	140	142	*Cr.* 7
Land purchases	*501,355	*280,575	*516,385	*482,627	*628,621
Lighthouses, harbour-works, and defences	9,026	6,517	12,159	13,581	10,863
Public buildings	115,427	121,364	145,600	197,455	216,192
Public Works departmental expenditure	12,572	12,933	16,404	12,819	16,089
Railway-construction and other works connected with railway-extension ..	417,937	717,723	1,333,941	759,753	828,704
Rates on Native lands ..	744	673	570	471	666
Roads	†316,753	†353,131	†435,669	†301,747	†387,595
Telegraph-extension ..	26,771	50,101	31,729	68,578	47,227
Development of goldfields..	21,815	15,907	15,325	24,213	16,278
Tourist and health resorts..	..	..	11,260	10,949	15,643
Lands improvement ..	..	..	1,677	2,348	2,019
State coal-mines	..	..	..	39,424	65,246
Payments to local bodies under Government Loans to Local Bodies Acts ..	68,770	138,956	208,531	234,870	195,652
Debentures issued to Midland Railway bondholders	..	..	..	..	150,000
Totals	1,571,604	1,746,141	2,890,767	2,283,198	2,715,627

* Including sums expended in the purchase of lands for settlement and expenses in connection therewith—viz., £158,586 in 1897-98; £518,459 in 1898-99; £469,331 in 1899-1900; £251,837 in 1900-1901; £498,124 in 1901-1902; £466,844 in 1902-1903; and £623,269 in 1903-1904. Interest recouped to Consolidated Fund has been included, being treated as expenditure out of the account.

† Including sums expended under Loans to Local Bodies Acts—viz., £31,363 in 1899-1900; £37,390 in 1900-1901; £31,979 in 1901-1902; £18,578 in 1902-1903; and £25,753 in 1903-1904.

NOTE.—*Excluding* amounts applied to investments by way of advances to settlers with charges and expenses, besides amounts for debentures redeemed and advances repaid.

The total amount of actual loan-moneys under various heads raised from the beginning is roughly shown further on in a table dealing with the public debt of the colony.

Although the Public Works Fund forms the main source of the expenditure out of loan accounts, all the money included in it has not been raised from loans. Amounts from the revenue of the Consolidated Fund were paid to the Public Works Fund during the last thirteen financial years as follows :—

	£
1891–92	30,000
1892–93	200,000
1893–94	250,000
1894–95	250,000
1895–96	150,000
1896–97	150,000
1897–98	300,000
1898–99	425,000
1899–1900	450,000
1900–1901	500,000
1901–1902	500,000
1902–1903	200,000
1903–1904	350,000
Total	£3,755,000

The expenditure each year since 1884 on services provided for by the Public Works Fund has been :—

Year.	Immigration.	Railways.	Roads.	Development of Goldfields.	Telegraph Extension.	Public Buildings.	Lighthouses, &c.	Other Services.	Totals.
	£	£	£	£	£	£	£	£	£
1884–85...	57,148	663,063	317,043	8,029	25,799	117,361	34,033	114,251	1,336,727
1885–86...	11,675	725,496	335,904	9,032	36,010	86,859	133,975	136,435	1,475,386
1886–87...	12,454	615,265	278,617	7,665	18,952	89,598	148,705	162,228	1,333,484
1887–88...	15,598	403,726	219,519	1,016	22,984	90,529	76,825	135,962	966,159
1888–89...	8,791	272,077	106,440	55	12,047	34,592	47,593	132,344	613,939
1889–90...	867	289,572	84,126	284	16,346	35,473	9,434	46,362	482,464
1890–91...	1,823	180,020	71,289	821	16,292	22,819	2,666	39,026	334,756
1891–92 ..	817	154,416	101,605	2,257	27,773	34,791	7,347	62,495	391,501
1892–93...	242	220,894	105,506	3,811	29,245	31,101	11,205	60,502	462,506
1893–94...	343	176,304	147,418	5,272	16,127	44,032	6,588	10,713	406,797
1894–95...	101	247,545	61,757*	5,865	19,229	54,190	3,145	9,578	401,410*
1895–96...	*Cr.* 10	197,105	66,774*	9,345	35,538	76,529	7,410	19,639	412,330*
1896–97...	301	207,231	64,292*	10,508	36,791	70,579	11,600	26,683	427,985*
1897–98...	70	351,600	290,777†	33,117	29,384	73,585	5,295	81,715	865,543†
1898–99...	105	374,141	295,534†	17,354	28,551	107,267	15,662	77,713	916,327†
1899–1900	385	417,937	285,532†	21,815	26,771	115,427	9,026	116,350	993,223†
1900–1901	214	717,723	315,791†	15,907	50,101	121,364	6,517	81,404	1,309,021†
1901–1902	140	1,333,941	403,690†	15,325	31,729	145,600	12,159	200,668	2,143,252†
1902–1903	142	759,753	283,169†	24,213	68,578	197,455	13,581	167,554	1,514,445†
1903–1904	*Cr.* 7	828,704	361,842†	16,278	47,227	216,192	10,863	315,728‡	1,796,841†

* Exclusive of moneys spent on roads under Lands Improvement, Native Lands Purchase, and Government Loans to Local Bodies Accounts: £103,076 in 1894–95, £162,757 in 1895–96, £173,358 in 1896–97.

† The expenditure on roads under the first two Acts mentioned above (*) is included as part of Public Works Fund; the sum of £18,770 was also spent out of Loans to Local Bodies Account on roads to open up Crown lands in 1897–98, £16,972 in 1898–99, £31,363 in 1899–1900, £37,390 in 1900–1901, £31,979 in 1901–1902, £18,578 in 1902–1903, and £25,753 in 1903–1904. These moneys have been excluded, as have also small sums expended in roading, &c., the Cheviot Estate.

‡ Including £150,000 debentures issued to Midland Railway bondholders.

Conversion Account.

Three-per-cent. stock to the value of £60,000 was inscribed during the year 1903–1904, which began with a credit balance of £1,662 in this account. Of this sum, £55,900 was applied to pay off 5-per-cent. debentures issued under "The Consolidated Loan Act, 1867," and debentures for £165,000 were issued in renewal of those of a similar amount under the Aid to Public Works and

Land Settlement Acts, 1896 and 1897. Expenses—the chief items of which were stamp duty (£375), and office expenses, rents, law charges, &c. (£348)—absorbed £723, leaving a credit balance in this account of £5,039 on the 31st March, 1904.

Loans for Government Advances to Settlers.

A notable feature in the legislation of the year 1894 was the passing of the Government Advances to Settlers Act, a description of which, with its amending Acts and the loan operations under the same, will be found in Part III.

The loans authorised to the 31st March, 1904, classified according to provincial districts, are shown in tabular form :—

Provincial Districts.	Loans authorised.		
	Number of Applications.	Amount applied for.	Amount of Advances authorised.
		£	£
Auckland	2,933	988,496	870,433
Taranaki	2,086	947,172	838,089
Hawke's Bay	906	283,080	255,700
Wellington	3,651	1,395,552	1,233,478
Marlborough	474	195,882	175,950
Nelson	198	63,970	57,310
Westland	190	50,740	43,620
Canterbury	1,146	361,737	317,925
Otago	2,829	1,191,391	1,061,535
Totals	14,413	5,478,020	4,854,040

Of the 14,413 advances authorised, 1,877 applicants declined the grants (£844,520) offered them, so that the net advances to the 31st March, 1904, numbered 12,536, and amounted to £4,009,520.

Of the total advances authorised, 11,687 were for advances under £500 in value, and 2,726 over.

The number of applications received to the 31st March, 1904, was 18,285, for an aggregate amount of £6,630,981.

The advances authorised on fixed loans, according to provincial districts, to the 31st March, 1904, were :—

Provincial Districts.	Number.	Amount of Mortgage.	Value of Security.
		£	£
Auckland	56	18,315	46,767
Taranaki	69	50,785	121,583
Hawke's Bay	21	7,770	18,064
Wellington	94	65,490	154,091
Marlborough	1	1,200	2,005
Nelson	3	250	963
Westland	6	670	2,113
Canterbury	21	18,730	41,791
Otago	97	82,145	172,831
Totals	368	245,355	560,208

The liabilities and assets at 31st March, 1904, of the Government Advances to Settlers Office were :—

Dr. *Liabilities.*	£ s. d.	Cr. *Assets.*	£ s. d.	£ s. d.
3-per-cent. Loan, redeemable 1st April, 1945, "A" ...	1,500,000 0 0	Investment Account— Advances on mortgage	3,980,100 0 0	
3-per-cent. Loan, redeemable 1st April, 1945, "B" ...	500,000 0 0	Less repayments ...	1,184,251 6 5	
Sundry loans	990,000 0 0			2,795,848 13 7
Advances on account of loans	200,000 0 0	Temporary investments, Bank of New Zealand ...		4,836 17 0
Assurance Fund	91,418 10 3	Temporary investments, 3-per-cent. stock		9,393 15 7
Suspense Account	4,424 2 7	Sinking Fund investment with Public Trustee ...		158,520 4 9
Accrued interest payable ...	32 12 6	Assurance Fund investment with Public Trustee ...		91,418 10 3
Profit and Loss Account ...	6,221 10 0	Mortgage instalments receivable, overdue		1,589 12 2
		Bills receivable		790 11 7
		Interest receivable, overdue		6,502 1 5
		„ accrued		29,752 1 1
		Loan-flotation charges ...		178,466 3 0
		Cash in hand and in bank ...		14,978 4 11
	£3,292,096 15 4			£3,292,096 15 4

"The Government Advances to Settlers Act Amendment Act, 1899," as an encouragement to the early payment of the prescribed instalments of interest on fixed loans, and of interest and principal on loans under the instalment principle, provides for a rebate to the mortgagor, which reduces his interest to 4½ per cent. in lieu of 5 per cent. per annum.

There are new alternative modes of disposing of moneys paid in advance laid down in this measure, but it is optional with mortgagors to adopt the new system instead of that previously in operation in respect of moneys paid before the commencement of the new Act, and which are held under the original arrangements.

Provision is made for the readjustment of loans by memorandum of adjustment, which gives elasticity to the system by treating the balance of principal due as a fresh loan granted for a new term.

The margin of security on loans is provided for as follows: In he case of fixed loans the amount of the loan is not to exceed three-fifths of the value of the security, while in case of loans under the instalment system on freehold security of first-class agricultural land the amount of the loan is not to exceed two-thirds the value of the security; on other rural freeholds the limit is three-fifths.

Advances may now be made on the security of urban or suburban land, but on the instalment system only, and with limitation of amount to a maximum of £2,000 and a minimum of £25.

Urban land is defined as that situate in a borough having a population of at least two thousand persons, and which is not used for farming, dairying, or market gardening; and suburban land means that which is situate in a borough having under two thousand people, or any town or vicinity, and which is not used for agricultural or dairying purposes as above referred to.

As to security for loans: In the case of urban lands on which there are buildings, the amount of the loan is not to exceed three-fifths of the value of the land apart from the buildings, *plus* one-half of the value of the buildings apart from the land. When the land is suburban, having buildings thereon, the loan is not to exceed one-half of the value of the land apart from the buildings, *plus* one-half of the value of the buildings separately.

When the land is urban or suburban, but has no buildings, the loan is not to exceed one-half of the value of the land, and there is not to be any loan except for the erection of buildings, and to be by way of instalments as erection proceeds.

There is a further subdivision of the Act, under which special provisions are made for protecting the interests of the Advances to Settlers Department with respect to other than freehold securities.

The legislation for authorisation of loan moneys for Advances to Settlers has been: Under the principal Act of 1894, £3,000,000; under the Amendment Act of 1901, £1,000,000.

New Zealand Consols.

Another financial Act, termed the New Zealand Consols Act, was passed in 1894, with the intention of providing further means of investment for the savings of persons resident in the colony. Some degree of progress has been made.

Up to the 31st March, 1899, deposits amounting to £385,925 had been received, in sums ranging from £5 to £150,000. During 1899–1900 the deposits inscribed totalled £55,562; in 1900–1901, £17,902; in 1901–1902, £8,935; in 1902–1903, £4,232; and 1903–1904, £1,720: making the sum invested to the 31st March, 1904, £474,276.

Aid to Public Works and Land Settlement.

"The Aid to Public Works and Land Settlement Act, 1896," empowered the Colonial Treasurer to raise £1,000,000—in aid of the Public Works Fund to the extent of £500,000, and the Lands Improvement Account and the Native Lands Purchase Account £250,000 each.

The Act passed in 1897 authorised the raising of an additional sum of £250,000, to be applied for the purpose of procuring £200,000 for further rolling-stock for railways, and for the repair of damages to lines by floods or otherwise; £25,000 for erection and repair of public-school buildings, and another sum of £25,000 for purposes of building and equipment of technical schools.

The Act of 1898 provided for raising £500,000, of which £175,000 was allocated to railways-construction, £200,000 was for new rolling-stock for open railways, and £125,000 for the construction of roads, bridges, and other works authorised.

Under another Act of 1899, the sum of £1,000,000 was authorised —£300,000 for railway-construction, £225,000 for rolling-stock, £350,000 for land-settlement and goldfields-development, £50,000 for school-buildings, £50,000 for purchase of Native lands, and £25,000 for harbour defence.

A further Act of 1900 provided for the raising of £1,000,000, of which £500,000 was allocated to railway-construction, £300,000 for rolling-stock, £150,000 for land-settlement, and £50,000 for goldfields-development.

Again, an Act of 1901 authorised raising the sum of £1,250,000. Of this, £600,000 was applied to railway-construction, £400,000 for rolling-stock, £200,000 for land-settlement, and £50,000 to development of goldfields.

The Act of 1902 authorised raising £1,750,000, to be devoted to railway-construction (£750,000), rolling-stock (£450,000), roads and bridges (£450,000), development of goldfields (£50,000), and telegraph-extension (£50,000).

"The Aid to Public Works and Land Settlement Act, 1903," authorised raising, in the colony or elsewhere, of sums not exceeding £1,000,000 altogether, by debentures or scrip, or by the creation or issue of inscribed stock under "The New Zealand Consolidated Stock Act, 1877."

Provision was made for obtaining funds pending the raising of the money authorised, by the sale, &c., of short-dated debentures, bearing interest not exceeding 4½ per cent. per annum, and having a currency of not more than seven years.

All the money raised under this Act is applied to the following purposes :—

	£
1. Railways—	
Railway-construction	450,000
Additional rolling-stock, &c., for open lines ..	150,000
2. Land-settlement and goldfields-development—	
Construction of roads, tracks, and bridges to open up back blocks, and other work in connection therewith	340,000
For developing goldfields	20,000
3. For telegraph-extension	40,000
	£1,000,000

Loans under Land for Settlements Acts.

The moneys raised under these Acts and the operations by way of purchasing estates to be cut up for close settlement form the subject of a special section of this part of the Year-book (No. XX.).

"The Local Bodies' Loans Act, 1901."

The above Act consolidates all former measures dealing with the borrowing-powers of local bodies. It does not affect the securities issued for any loan raised under any Act repealed.

"The Local Bodies' Loans Amendment Act, 1903."

As to Government loans to local bodies, the yearly rate of interest and the period during which interest is payable by the local authority shall, at the option of such authority, be—

(*a.*) Five per centum per annum for a period of twenty-six years; or

(*b.*) Four and a half per centum per annum for a period of thirty-two years; or

(*c.*) Four per centum per annum for a period of forty-one years.

Such option shall be exercised by the local authority in its application for the loan.

At the expiration of the period during which interest is payable the liability of the local authority shall cease without further payment.

SECTION XVIII.—FINANCE—*continued.*

Subsection B.—Taxation.

Direct Taxation.

The direct taxation prior to 1892 consisted of a property-tax of 1d. in the pound on all assessed real and personal property (with an exemption of £500), and the stamp duties; but in 1891 a Land and Income Assessment Act was passed repealing the property-tax. A full description of the system of the land and income tax will be found in a special article in Part III. of this work. The leading features only are briefly stated here.

The Assessment Act of 1891 provided for an ordinary land-tax on the actual value of land, allowing an owner to deduct any amount owing by him secured on a registered mortgage. Under the original Act the deduction for improvements might not exceed £3,000; but by the Amendment Act of 1893 the value of all improvements whatsoever was exempted from liability to land-tax. Besides this, an exemption of £500 was allowed when the balance, after making deductions as above stated, was not above £1,500; and beyond that a smaller exemption was granted, but ceasing when the balance amounted to £2,500. There is a consolidation Act passed in 1900 now in force, with amendments made in 1903. Mortgages are subject to the land-tax, but in 1902–1903 and for 1903–1904 the rate was lowered from the full amount to ¾d. in the pound. The revenue from the ordinary land-tax is, in round numbers, about £233,000 per annum. The rate of ordinary land-tax for 1903–1904 was 1d. in the pound. Native land occupied by Europeans is taxed ½d. in the pound on the unimproved value.

In addition to the ordinary land-tax, there is a graduated land-tax, which commences when the unimproved value is £5,000. For the graduated land-tax the present value of all improvements is deducted; but mortgages are not deducted. The Act of 1893, while reducing the ordinary taxation on land by exempting all improvements, increased the graduated tax. Under the subsequent Act passed in 1903 the rates of graduated tax have been again increased, and the revised rates are now one-sixteenth of a penny in the pound sterling when the value is £5,000 and is less than £7,000, from which the rate increases with the value of the pro-

perty by further steps of a sixteenth of a penny until the maximum of 3d. in the pound is reached, payable when the value is £210,000, or exceeds that sum.

This graduated tax yields, in round numbers, £102,000 per annum, which is not included in the sum of £233,000 given above. Fifty per cent. additional tax is levied in case of persons who have been absent from the colony for not less than one year prior to the passing of the yearly taxing Act. This amounts to about £3,550, and is included in the £102,000 shown above.

Graduated tax is not chargeable on Native land.

Besides the land-tax (ordinary and graduated) there is also levied by way of further direct taxation an income-tax on all incomes above £300. From the yearly income of every taxpayer there is deducted by way of special exemption the sum of £300, and from taxable incomes a further deduction up to £50 per annum for life-insurance premiums is allowed. The rate of income-tax for 1903–1904 was 6d. in the pound on the first taxable £1,000, and 1s. in the pound on any excess of £1,000.

Companies pay 1s. in the pound, and are not allowed exemption. The Act of 1893 further disallowed the £300 exemption in the case of persons not domiciled in New Zealand.

The revenue derived from income-tax may be roughly set down at £221,000 per annum.

Indirect Taxation.

The indirect taxation is made up of Customs duties, and excise duty on beer made in the colony.

The following statement shows the total amount raised by the General Government taxation in 1885, 1890, and the last nine financial years ending 31st March :—

	Amount of Revenue raised by Taxation.	Amount per Head of Population (excluding Maoris).
	£	£ s. d.
1885	2,016,730 ..	3 10 10
1890	2,173,985 ..	3 10 0
1895–96	2,335,761 ..	3 7 1
1896–97	2,521,911 ..	3 11 0
1897–98	2,678,576 ..	3 13 11
1898–99	2,707,099 ..	3 13 3
1899–1900	2,891,126 ..	3 16 10
1900–1901	3,042,890 ..	3 19 6
1901–1902	3,113,079 ..	3 19 8
1902–1903	3,277,964 ..	4 1 8
1903–1904	3,649,601 ..	4 8 4

The average annual amount of revenue raised by taxation during the period 1895–96 to 1903–1904 has been £3 16s. 10d.

It may be well to call attention to the fact that a rise in the amount of taxation yielded per head of population may indicate (outside the question of increasing the rate of any particular tax levied) a satisfactory condition of business, as showing activity.

As the Maoris contribute somewhat to the Customs revenue, an allowance should be made on that account to ascertain more correctly the amount of taxation per head of the rest of the people. By including Maoris the Customs and excise duties per head of the rest of the population would be reduced by 3s. 3d. for the year 1903–1904. If this amount be deducted from the taxation per head given for that year, the rate would be reduced from £4 8s. 4d. to £4 5s. 1d. This latter rate may fairly be used for comparison with the rates in the States of Australia.

Of the total amount of taxation stated for the year 1903–1904, the indirect taxation—*i.e.*, Customs and excise duties—amounted to £2,698,046, while land and income tax, with stamps for taxation, yielded £951,555, which constitutes direct taxation. So that the colony still raises nearly 74 per cent. of its taxation revenue by means of the indirect method.

A table of the Customs tariff is given in detail in Part I. of this book (pp. 84–102), and the duties leviable upon estates of deceased persons on page 104.

Growth of Amount paid in Income-tax.

The amounts paid by way of income-tax, under a uniform rate of taxation, show great increase year by year, and afford satisfactory evidences of prosperity. These are quoted with a caution in regard to the figures for 1892 to 1895. The full number of persons properly liable to the tax may not have been ascertained at such time.

	Income-tax paid. £
1892–93	67,367
1893–94	75,238
1894–95	89,891
1895–96	92,778
1896–97	105,504
1897–98	115,210
1898–99	115,480
1899–1900	128,721
1900–1901	173,809
1901–1902	179,397
1902–1903	200,684
1903–1904	221,369

The increase from 1895–96 to 1903–1904 is £128,591, being a rate of 138 per cent., while the population increased during the same period by 19 per cent.

Taxation by Local Governing Bodies.

The various local bodies levied taxation during the year ended 31st March, 1903, to the amount of £949,912, or £1 3s. 8d. per head of European population. Of the total sum, £581,463 was raised by general rates, £235,252 by special and separate rates, £83,307 by licenses, and £19,890 by other taxes.

Taxation in Australasia.

The following were the amounts and rates of General Government taxation per head of population in Australasia for 1902–1903, specifying the proportions derived from Customs and other taxes :—

State or Colony.	Amount of Revenue raised by Taxation.			Proportion of Taxation from Customs and Excise Duties.
	Customs and Excise.	Other Taxes.	Total.	
	£	£	£	Per Cent.
Queensland	1,261,066	415,688	1,676,754	75·21
New South Wales ..	3,478,742	1,108,781	4,587,523	75·83
Victoria	2,499,014	859,972	3,358,986	74·40
South Australia ..	689,727	398,941	1,088,668	63·36
Western Australia ..	1,395,997	221,247	1,617,244	86·32
Tasmania	360,607	105,401	466,008	77·38
New Zealand	2,426,043	851,921	3,277,964	74·01

State or Colony.	Rate of Taxation per Head of Mean Population.		
	Customs and Excise.	Other Taxes.	Total.
	£ s. d.	£ s. d.	£ s. d.
Queensland	2 9 6	0 16 2	3 5 8
New South Wales	2 9 5	0 15 10	3 5 3
Victoria	2 1 6	0 14 3	2 15 9
South Australia	1 17 8	1 1 10	2 19 6
Western Australia	6 9 10	1 0 7	7 10 5
Tasmania	2 0 9	0 12 0	2 12 9
New Zealand	3 0 5	1 1 3	4 1 8*

*Or, including Maoris, £3 18s. 7d. (See remarks on previous page.)

One measure of the burden of taxation is found in the proportion it bears to the total production of the country. It is roughly estimated that the value of the annual production from all industries

in New Zealand is about £30,000,000. The proportion of taxation for 1902 as compared with that for the principal Australian States is shown below. The figures for Australia are worked on the estimated value of production as stated by Mr. Coghlan. Proportion per cent. of taxation to total production: Queensland, 12·42; New South Wales, 12·40; Western Australia, 11·72; South Australia, 11·22; Victoria, 11·20; New Zealand, 10·93. These figures would appear to show that in New Zealand, where the yield of the taxation per head of population is decidedly higher than in Australia, the proportion of such yield of taxes to the total value of the production is, nevertheless, lower.

It might be inferred from these calculations that the production of New Zealand is higher per inhabitant than that of the Australian States. Mr. Coghlan may be again quoted here. He gives production of New South Wales as £26 9s. 11d. per head; Victoria, £24 16s. 10d.; Queensland, £26 8s. 3d.; South Australia, £26 12s. 3d. New Zealand, £37 16s. 11d.

SECTION XVIII.—FINANCE—*continued.*

Subsection C.—Public Debt.

The gross public debt of the colony on the 31st March, 1904, was £57,522,215, an increase of £1,623,196 on the amount owing at the end of the preceding financial year. The net debt increased by £1,478,548, and on 31st March, 1904, stood at £55,064,328.

Of this increase, £511,350 was devoted to the purchase of lands for settlement; £205,000 for loans to local bodies; £1,720 for New Zealand Consols deposits; and £55,000 for development of State coal-mines: making a total of £773,070 invested in a directly reproductive manner, outside of money used for railway and telegraph construction, which might almost be considered as of a similar nature. The above sum of £773,070 does not include £150,000 payment to Midland Railway bondholders.

The following table states the debentures and stock in circulation on 31st March, 1904, under the several Loan Acts or Ordinances of the Colonial and old Provincial Governments, the dates when redeemable, the estimated sinking funds accrued in respect of the same, and the annual charge thereon for interest and sinking fund:—

PUBLIC DEBT ON 31ST MARCH, 1904.

—	Amount outstanding.	Due Date.	Sinking Funds accrued, estimated.	Net Indebtedness.	Annual Charge.			Remarks.
					Rate.		Amount.	When payable.	
					Int.	S.F.			
	£	£	£	£	£ s. d.	£ s. d.	£		
New Zealand Loan Act, 1863	...	266,300	15 July, 1914	155,161	111,139	5	1	15,978	15 Jan. and 15 July.	
Consolidated Loan Act, 1867	...	180,500	Ann. drawing	...	180,500	5	...	9,025	Quarterly, 15 Jan., &c.	
Immigration and Public Works Loan Act, 1870	...	*1,000,000	1 June, 1907	807,752	192,248	4	2·4	64,000	1 June and 1 Dec. ...	Sinking fund payable 13 Mar. and 13 Sept. *Only £200,000 has actually been issued to the public.
Canterbury Loan Ordinance, 1862	3,000 12,200	15,200	2 Jan., 1915 2 July, 1916	15,157	43	6	1	1,120	30 June and 31 Dec.	
Consolidated Loan Act, 1867	...	13,000	15 April, 1913	...	13,000	4	...	520	15 April and 15 Oct.	
Immigration and Public Works Loan Act, 1870	363,000 27,900	390,900	15 April, 1913 15 April, 1913	... ...	363,000 27,900	4 4½	... ...	14,520 1,256	15 April and 15 Oct. 15 April and 15 Oct.	
Defence and other Purposes Loan Act, 1870	25,000 75,000	100,000	1 July, 1910 15 April, 1913	... ...	25,000 75,000	4½ 4	... ...	1,125 3,000	30 June and 31 Dec. 15 April and 15 Oct.	
General Purposes Loan Act, 1873	17,400 10,800 54,700	82,900	15 Oct., 1913 15 May, 1914 28 Nov., 1914	... ...	17,400 10,800 54,700	4 4 5	... ...	696 432 2,735	15 April and 15 Oct. 15 May and 15 Nov. 15 May and 15 Nov.	† The sinking fund is payable on £2,227,100 (1½ per cent. on £1,455,658, 1 per cent. on £47,520, and ½ per cent. on £723,922); the Land Assurance Fund is also charged with ½ per cent. as a contribution towards sinking fund.
District Railways Purchasing Acts, 1885–86	40,000 97,100	137,100	1 July, 1909 1 April, 1905	... ...	40,000 97,100	6 4	... ...	2,400 3,884	1 April and 1 Oct.	
Government Loans to Local Bodies Act, 1886	...	250,300	1 Sept., 1907	...	250,300	3½	†	34,688	1 Mar. and 1 Sept.	
Carried forward ...	...	2,436,200	...	978,070	1,458,130	...	...	155,379		

Public Debt on 31st March, 1904—*continued.*

—	Amount outstanding.		Due Date.	Sinking Funds accrued, estimated.	Net Indebtedness.	Annual Charge. Rate. Int.	Rate. S.F.	Amount.	When payable.	Remarks.
	£	£		£	£	₱ c.	₱ c.	£		
Brought forward ...	...	2,436,200	...	978,070	1,458,130	...	...	155,379		
Consolidated Stock Act, 1877	29,150,302	44,884,466	1 Nov., 1929	...	29,150,302	4	...	1,166,012	1 May and 1 Nov.	
	6,161,167		1 Jan., 1940	...	6,161,167	3½	...	215,641	1 Jan. and 1 July.	
	9,572,997		1 April, 1945	...	9,512,997	3	...	287,190‡	1 April and 1 Oct.	‡ £89,700 of this amount will be recouped by the Government Advances to Settlers Office.
Consolidated Stock Act, 1884—										
Colonial issue ...	332,600	1,007,100	1 Sept., 1905	...	842,100	3½	...	29,473	1 Mar. and 1 Sept.	
	509,500		31 Dec., 1907	...						
	65,000		4 Jan., 1909	...	65,000	3	...	1,950		
	100,000		4 Jan., 1909	...	100,000	3½	...	3,500		
Native Land Purchases Act, 1892 (Renewed under the Aid to Public Works and Land Settlement Act, 1899)	...	125,000	31 Oct., 1906	...	125,000	3½	...	4,375	30 April and 31 Oct.	
Land for Settlements Act, 1892 (Renewed under the Land for Settlements Acts Amendment Act, 1899)	...	45,276	31 Oct., 1906	...	45,276	3½	...	1,585	30 April and 31 Oct.	
Lands Improvement and Native Lands Acquisition Act, 1894	...	400,000	30 Sept., 1908	...	283,000	4	...	11,320	31 Mar. and 30 Sept.	
					117,000	3½	...	4,095	31 Mar. and 30 Sept.	
New Zealand Consols Act, 1894	...	474,276	1 Feb., 1910	...	474,276	3½	...	16,599	1 Feb. and 1 Aug.	
Land for Settlements Acts, 1894, 1897, 1899, and 1900	769,490	3,233,690	31 Oct., 1906	...	769,490	3½	...	26,932	30 April and 31 Oct.	
	349,000		1 April, 1909	...	349,000	3½	...	13,088	1 April and 1 Oct.	
	62,000		1 April, 1909	...	62,000	3½	...	2,170	1 April and 1 Oct.	
	56,000		1 April, 1905	...	56,000	4	...	2,240	1 April and 1 Oct.	
	10,000		1 April, 1906	...	10,000	3½	...	350	1 April and 1 Oct.	
	527,950		1 May, 1904	...	527,950	4	...	21,118	1 May and 1 Nov.	
	21,000		1 Nov., 1904	...	21,000	4	...	840	1 May and 1 Nov.	
	412,900		1 Feb., 1905	...	412,900	4	...	16,516	1 Feb. and 1 Aug.	
	2,100		1 Feb., 1905	...	2,100	3½	...	73	1 Feb. and 1 Aug.	
	100,000		1 Dec., 1906	...	100,000	4	...	4,000	1 June and 1 Dec.	
	442,600		1 Feb., 1908	...	442,600	4	...	17,704	1 Feb. and 1 Aug.	
	230,650		1 Aug., 1908	...	230,650	4	...	9,226	1 Feb. and 1 Aug.	
	250,000		1 April, 1904	...	250,000	4	...	10,000	1 April and 1 Oct.	

Aid to Public Works and Land Settlement Acts, 1896, 1897, 1898, 1899, 1900, 1901, 1902, and 1903	500,000	3,848,950	15 Aug., 1921*	...	500,000	3½	...	17,500	15 Feb. and 15 Aug.	* Loan may be paid off at any time after 15th February, 1907, on six months' notice being given.
	100,000		15 Jan., 1905	...						
	100,000		15 Feb., 1905	...						
	100,000		15 Mar., 1905	...	500,000	3	...	15,000	31 Mar. and 30 Sept.	
	100,000		17 April, 1905	...						
	100,000		15 May, 1905	...						
	100,000		16 July, 1905	...						
	100,000		15 Aug., 1905	...	300,000	†	...	10,500	31 Mar. and 30 Sept.	† ¼ per cent. over bank rate; varying interest, calculated at 3½ per cent.
	100,000		15 Sept., 1905	...						
	500,000		1 April, 1904	...	500,000	4	...	20,000	1 April and 1 Oct.	
	250,000		1 Dec., 1904	...	250,000	4	...	10,000	1 June and 1 Dec.	
	750,000		1 Dec., 1906	...	750,000	4	...	30,000	1 June and 1 Dec.	
	20,000		1 Feb., 1908	...						
	250,000		1 April, 1905	...	465,000	4	...	18,600	1 April and 1 Oct.	
	175,000		1 April, 1906	...						
	20,000		1 April, 1908	...						
	299,800		1 Feb., 1924‡	..	500,000	4	...	20,000	1 Feb. and 1 Aug.	‡ Loan may be paid off at any time after 1st February, 1909, on six months' notice being given.
	200,200		1 Feb., 1909	...						
	83,950		1 Jan., 1909	...	83,950	4	...	3,358	1 Jan. and 1 July.	
Government Advances to Settlers Act, 1894	...	200,000§	...	...	200,000	†	...	7,000	...	§ Short-dated debentures.
Dairy Industry Act, 1898	438	1,781	1 Aug., 1908	...	1,781	3½	...	62	1 Feb. and 1 Aug.	
	843		1 Jan., 1911	...						
	500		1 Jan., 1916	...						
Local Bodies' Loans Act, 1901	...	555,000	1 Jan., 1909	...	555,000	3½	...	19,425	1 Mar. and 1 Sept.	
State Coal-mines Act, 1901 ...	...	107,000	1 April, 1907	...	107,000	3½	...	3,745	1 April and 1 Oct.	
Paeroa-Waihi Railway Act, 1903	...	53,476	31 Mar., 1912	...	53,476	3	...	1,604	31 Mar. and 30 Sept.	
Midland Railway Petitions Settlement Act, 1902	...	150,000	1 Jan., 1906	...	150,000	3½	...	5,250	1 July and 1 Jan.	
		57,522,215		978,070	56,544,145					
Add—										
Accrued sinking fund in respect of the Government Loans to Local Bodies Acts	...	...	...	354,097‖						‖ Represents the accrued sinking fund held by Public Trustee in respect of the total amount issued under the Government Loans to Local Bodies Acts, of which £1,421,800 has been converted into consolidated stock.
Sinking fund, Government Advances to Settlers Office Account	...	...	...	158,520						
Investments in securities included above on account New Zealand Consols Investment Account	...	...	...	457,200						
Bank of New Zealand Preference Shares held by Government	...	...	...	500,000	1,479,817					
Totals	...	57,522,215¶	...	2,457,887	55,064,328	...	...	2,203,420		¶ Treasury bills amounting to £700,000 are not included.

A condensation of this table shows at a glance the amount of money that will be required in the near future for meeting the liabilities arising at the expiration of the terms of the loans. Taking the position as at present, and dealing with the term of six years 1904–1909, the total sum falling due is found to be £10,060,054.

From the year 1910 onwards to 1921 the amounts becoming due annually are comparatively small.

In 1929 (25 years hence) and from then the bulk of the debt will have to be dealt with—that is, about forty-five millions of money out of a total of fifty-seven millions and a half.

Due Date.	Amount.	Due Date.	Amount.
	£		£
1904	1,548,950	1916	12,700
1905	1,950,700	1921	500,000
1906	2,124,766	1929	29,150,302
1907	1,866,800	1940	6,161,167
1908	1,113,688	1945	9,572,997
1909	1,455,150	Annual drawing..	180,500
1910	499,276	Short-dated debentures ..	200,000
1911	843		
1912	53,476		
1913	496,300		£57,522,215
1914	331,800		
1915	3,000		

Net Indebtedness: Comparison with Past Years.

The net public debt, after deducting the accrued sinking fund (£2,457,887), was on 31st March, 1904, £55,064,328, an increase of £1,478,548 during the year. Nearly eight years' revenue, ordinary and territorial, at the present rate would thus be required to pay off the net debt of the colony. The net indebtedness per head of population for 1903–1904 is less than in 1902–1903 by 2s. 7d. In March, 1890, it stood at £60 5s. 3d.; in 1891, £59 11s. 10d.; in 1892, £59 2s.; in 1893, £58 2s. 7d.; in 1894, £57 8s. 10d.; in 1895, £57 9s. 9d.; in 1896, £60 2s. 4d.; in 1897, £60 13s. 9d.; in 1898, £60 4s. 11d.; in 1899, £61 14s. 4d.; in 1900, £61 17s. 3d.; in 1901, £62 16s. 10d.; in 1902, £65 12s. 4d.; in 1903, £65 15s. 3d.; and in 1904, £65 12s. 8d. But, in considering the increase of the amount of debt per head *as a burden on the people*, attention should be given to the remarks following the table showing amounts paid by way of charges of the public debt out of the revenue year by year. Besides these remarks, under the head of "Interest and Sinking Funds" there are others bearing on the subject, given previously, under "Revenue," which is shown to have been relieved substantially since the year 1890.

Years ended 31st March.	Estimated or Census Population.	Amount of Debentures and Stock in Circulation.	Gross Indebtedness per Head of European Population.	Amount of Sinking Fund accrued.	Net Indebtedness.	Net Indebtedness per Head of European Population.
		£	£ s. d.	£	£	£ s. d.
1890 ..	618,657	38,667,950	62 10 1	1,386,185	37,281,765	60 5 3
1891 ..	626,658	38,830,350	61 19 4	1,487,042	37,343,308	59 11 10
1892 ..	637,472	38,713,068	60 14 8	1,037,862	37,675,206	59 2 0
1893 ..	656,187	39,257,840	59 16 7	1,113,770	38,144,070	58 2 7
1894 ..	676,747	39,826,415	58 17 0	951,924	38,874,491	57 8 10
1895 ..	689,475	40,386,964	58 11 6	751,932	39,635,032	57 9 9
1896 ..	703,187	43,050,780	61 4 5	778,891	42,271,889	60 2 4
1897 ..	717,649	44,366,618	61 16 5	814,294	43,552,324	60 13 9
1898 ..	731,713	44,963,424	61 9 0	881,903	44,081,521	60 4 11
1899 ..	746,673	46,938,006	62 17 3	857,279	46,080,727	61 14 4
1900 ..	758,616	47,874,452	63 2 2	944,375	46,930,077	61 17 3
1901 ..	772,719	49,591,245	64 3 7	1,033,494	48,557,751	62 16 10
1902 ..	789,994	52,966,447	67 0 11	1,128,816	51,837,631	65 12 4
1903 ..	814,842	55,899,019	68 12 0	2,313,239*	53,585,780*	65 15 3
1904 ..	838,954	57,522,215	68 11 4	2,457,887*	55,064,328*	65 12 8

The debt of the colony as above stated does not include the unpaid loans raised by the several local bodies, amounting at the end of March, 1903, to £8,217,196, of which sum £5,336,600 was raised outside the colony. These are referred to in dealing with the finance of local bodies.

Increase of Gross Public Debt.

The increase of the gross public debt since the 31st March, 1891, amounts to £18,691,865. A schedule of items composing this sum is subjoined. It shows the purposes to which the money raised has been or is being devoted. The second largest item is £3,190,000 raised for advances to settlers, which represents investments by the Government bearing interest and lent on continually improving security, the principal being repaid by instalments.

Other items which may be considered to represent interest-bearing investments are those under the heads "Land settlement," "Native land purchases," "Loans to local bodies," "Lands improvement," "N.Z. Consols," and "Bank of N.Z. preferred shares."

* With these figures, in addition to the customary deduction made for sinking funds accrued, there has been included the accrued sinking funds of the Government Advances to Settlers Office, an item previously not shown in the table. The gross debt is also further reduced by taking off the amount of Government securities in which the New Zealand Consols deposits are invested, as both amounts appear in the table of the public debt. £500,000, the value of the preference shares held by the Government in the Bank of New Zealand, is also deducted.

	£	£
Gross public debt, 31st March, 1904		57,522,215
" 31st March, 1891		38,830,350
Increase		£18,691,865
Native land purchases	649,700	
Land settlement (including Cheviot)	3,622,766	
Loans to local bodies	1,902,100	
Lands improvement	500,000	
Advances to settlers	3,190,000	
Bank of N.Z. preference shares	500,000	
N.Z. Consols	474,276	
District railways	47,000	
Public works	7,122,426	
Increase by conversions	670,569	
Sinking fund accretions	1,582,800	
Naval and military settlers	27,226	
Government accident insurance	2,000	
Advances to dairy companies	1,781	
State coal-mines	107,000	
		20,399,644
Less Redemptions—		
Consolidated Stock Act, 1884, debentures	1,260,420	
Other debentures	447,359	
		1,707,779
Total net increase		£18,691,865

The above addition to the public debt, mainly for purposes of a directly reproductive nature, does not represent the whole expenditure on public works and services during the period. Out of surplus revenue since 1891, the sum of £3,755,000 has been transferred to the Public Works Fund and expended, thus substantially increasing the value of the national estate without a corresponding augmentation of the public liability.

Interest and Sinking Fund.

Of the total amount of outstanding public debt at the end of March, 1904—viz., £57,522,215—more than thirty-five millions sterling bore interest at the rate of 4 per cent., nearly eleven millions sterling at 3½ per cent., and more than ten millions sterling at 3 per cent. The following are the rates of interest payable on the complete public debt:—

Rates of Interest.	Amount at each Rate. £
6 per cent.	55,200
5 per cent.	501,500
4½ per cent.	52,900
4 per cent.	35,599,652
3¾ per cent.	349,000
3½ per cent.	10,772,490*
3 per cent.	10,191,473
Total	£57,522,215

* Including £500,000 on which the interest paid was ¼ per cent. over bank rate: varying rate, averaging 3½ per cent.

The total amount of *interest* payable to bondholders on the full amount of the public debt as quoted above is £2,150,622, which gives an average rate of £3 15s. 7d. per £100. On the total public debt outstanding on the 31st March, 1891, the average interest charge was £4 10s. 3d. per £100. During the period 1891–1904, therefore, the average rate is found to have declined by 14s. 8d. per £100, or 16 per cent.

The foregoing refers to interest payable to bondholders only, and has nothing to do with sinking-fund requirements, which are included in the whole annual charge of the public debt.

The *actual payments* during nine years for interest *and sinking fund out of the Consolidated Fund* are shown hereunder, together with the percentage of ordinary and territorial revenue absorbed by the public-debt charges :—

Year ended 31st March.	Amounts actually paid for Interest and Sinking Fund out of the Consolidated Fund.					Rate per Head of Mean Population.			Percentage of Revenue absorbed by Public Debt Charges.
	Public Debt.			Treasury Bills.	Total.				
	Interest.	Sinking Fund.	Total.	Interest.					
	£	£	£	£	£	£	s.	d.	
1895 ..	1,619,925	57,979	1,677,904	38,985	1,716,889	2	10	3	38·96
1896 ..	1,602,933	41,183	1,644,116	39,659	1,683,775	2	8	4	36·96
1897 ..	1,630,577	41,858	1,672,435	37,034	1,709,469	2	8	2	35·62
1898 ..	1,668,697	43,380	1,712,077	29,336	1,741,413	2	8	1	34·28
1899 ..	1,689,749	44,651	1,734,400	33,068	1,767,468	2	7	10	33·61
1900 ..	1,674,618	46,073	1,720,691	28,703	1,749,394	2	6	6	31·07
1901 ..	1,671,552	46,364	1,717,916	27,700	1,745,616	2	5	6	29·83
1902 ..	1,722,819	47,724	1,770,543	33,396	1,803,939	2	6	2	29·80
1903 ..	1,817,701	50,464	1,868,165	32,814	1,900,979	2	7	5	29·77
1904 ..	1,875,376	53,408	1,928,784	29,179	1,957,963	2	7	4	27·89

NOTE.—The alteration made in 1894-95 of the system which previously obtained in dealing with the drawing loan of 1867 has affected the comparison of the figures for the last ten years with those preceding. The total amount actually paid for interest and sinking fund in 1889-90 was, under the old system, £1,897,602. The figures for each of the years ended March, 1890 to 1894 inclusive, will be found in the Year-book for 1899.

The above amounts shown as interest and sinking fund do not comprise the whole of the interest and sinking fund paid by the Government in respect of moneys raised by the issue of loans. Thus, for loans raised under the Land for Settlements Acts, the Government Advances to Settlers Acts, and for the purchase of the Cheviot Estate, the interest, although made a charge upon the Consolidated Fund, is recovered from the receipts derived from the leasing of the lands, or from instalments paid by borrowers. The amount of interest thus charged and recovered during last year was £215,143 (under the Land for Settlements Acts, £115,088 ; Advances to Settlers Act, £89,117 ; Cheviot Estate, £8,866 ; other amounts, £2,072). Such interest does not become a burden upon the taxpayer, and consequently is not included in the figures upon which the rate per head of mean population is calculated.

The amount actually paid for interest and sinking fund out of the Consolidated Fund during 1903–1904 was £56,984 more than that for the previous year, and the rate of charge per head of population increased somewhat.

The securities in which the sinking funds were held as on the 31st March, 1904, are specified in the statement following :—

STATEMENT of the SECURITIES in which the SINKING FUNDS of the several LOANS were invested on the 31st March, 1904.

Investments in—	£	s.	d.
New Zealand 5-per-cent. Debentures	3,470	0	0
New Zealand 4½-per-cent. Debentures	1,700	0	0
New Zealand 3½-per-cent. Debentures	1,250	0	0
New Zealand 4-per-cent. Inscribed Stock	129,754	19	6
New Zealand 3½-per-cent. Inscribed Stock	2,571	3	7
New Zealand 3-per-cent. Inscribed Stock	9,229	9	2
New South Wales 4-per-cent. Debentures	19,800	0	0
New South Wales 4-per-cent. Inscribed Stock	5,486	6	7
New South Wales 3½-per-cent. Inscribed Stock	84,384	16	10
New South Wales 3-per-cent. Inscribed Stock	71,386	18	4
Victoria 4-per-cent. Debentures	15,000	0	0
Victoria 4-per-cent. Inscribed Stock	43,233	17	4
Victoria 3½-per-cent. Inscribed Stock	84,000	0	0
Victoria 3-per cent. Inscribed Stock	27,429	4	1
South Australia 4-per-cent. Debentures	24,700	0	0
South Australia 4-per-cent. Inscribed Stock	4,851	0	5
South Australia 3½-per-cent. Inscribed Stock	38,068	11	6
South Australia 3-per-cent. Inscribed Stock	114,866	15	9
Canada 4-per-cent. Debentures	18,200	0	0
Canada 4-per-cent. Inscribed Stock	60,000	0	0
Canada 3½-per-cent. Inscribed Stock	34,022	11	8
Canada 3-per-cent. Inscribed Stock	33,226	12	3
Canada 2½ per-cent. Inscribed Stock	13,666	15	11
Tasmania 3-per-cent. Inscribed Stock	6,645	15	1
Queensland 4-per-cent. Inscribed Stock	1,433	8	8
Ceylon 3-per-cent. Inscribed Stock	10,000	0	0
Transvaal 3-per-cent. Guaranteed Stock	30,994	9	9
Leeds Corporation 3-per-cent. Inscribed Stock	14,000	0	0
Cardiff Corporation 3-per-cent. Inscribed Stock	26,000	0	0
Gold Coast 3-per-cent. Inscribed Stock	17,121	14	10
Reading Corporation 3-per-cent. Inscribed Stock	6,500	0	0
Sheffield Corporation 3-per-cent. Inscribed Stock	16,000	0	0
Aid to Public Works and Land Settlements Act 4-per-cent. Debentures	660	0	0
Land for Settlements Act 4-per-cent. Debentures	2,885	0	0
Local Bodies' Loans Act 3½-per-cent. Debentures	400	0	0
County of Tauranga 5-per-cent. Debentures	60	0	0
Borough of Brunner 6-per-cent. Debentures	840	0	0
Borough of Hokitika 6-per-cent. Debentures	1,860	0	0
Borough of Patea 4½-per-cent. Debentures	200	0	0
Borough of Tauranga 5-per-cent. Debentures	200	0	0
Westport Harbour Board 4-per-cent. Debentures	550	0	0
Waimakariri-Ashley Water-supply Board 5-per-cent. Debentures	320	0	0
Wellington and Manawatu Railway Company 5-per-cent. Debentures	540	0	0
	977,509	11	3

	£	s.	d.
Brought forward	977,509	11	3
Sinking funds in respect of Local Bodies' Loans Act, 1901, and Government Advances to Settlers Act, 1894—			
Mortgages	61,900	0	0
In common fund, Public Trust Office—			
At 4 per cent. £6,000 0 0			
At 3½ per cent. 454,717 4 11			
460,717	4	11	
	1,500,126	16	2
Cash balance on 31st March, 1904	667	17	8
Total	£1,500,794	13	10

Of the total amount, £541,287 is represented by stock and debentures of the Australian States, and £169,116 by those of Canada and Ceylon; £151,921 was invested in similar securities of the New Zealand Government; £62,500 in inscribed stock of English corporations; £30,994 in Transvaal Guaranteed stock; £4,030 in debentures of various local governing bodies; other securities, £17,662; £61,900 on mortgage; and £460,717 is in the hands of the Public Trustee.

Flotation of Loans.

Of the gross public debt of the colony outstanding on 31st March, 1904, £48,048,842 was raised in London, £793,900 in Australia, and £8,679,473 in New Zealand; and of the total amount £45,302,842 was held as inscribed stock, and £12,219,373 in the form of debentures. Details are given hereunder:—

Kind of Stock.	Floated in			Total.
	London.	Australia.	New Zealand.	
	£	£	£	£
Debentures ..	3,220,276	793,900	8,205,197	12,219,373
Inscribed stock ..	44,828,566	...	474,276	45,302,842
Total ..	48,048,842	793,900	8,679,473	57,522,215

Prices of New Zealand Stock.

The highest and lowest London prices for the New Zealand 4, 3½, and 3 per cent. stock, taken over a range of fifteen years, are quoted:—

QUOTATIONS, NEW ZEALAND STOCK.

Year.	4-per-cents. (1929)		3½-per-cents. (1940)		3-per-cents. (1945)	
	Highest.	Lowest.	Highest.	Lowest.	Highest.	Lowest.
1888	104½	96¼	..	..	..	..
1889	109¼	99⅝	..	..	..	..
1890	109⅛	102¼	98⅝	93½	..	..
1891	107½	100	98¼	91⅛	..	..
1892	106⅝	100	98	91½	..	..
1893	107¼	97	97½	90	..	..
1894	109⅞	105⅜	103½	96¼	..	..
1895	113½	105⅝	107½	100	95⅜	91
1896	118¼	106½	110⅜	101½	103½	90
1897	117	112⅜	111	104¾	102	99½
1898	116⅞	108	109⅞	103	101½	96⅞
1899	116½	105½	109	102	99¼	94¼
1900	113¼	109	106¾	103⅜	98½	95¼
1901	115⅜	110¾	109¾	104⅛	99½	93⅛
1902	113¼	109	109½	102⅛	97	93⅝
1903	110⅛	105	104¾	99½	96	88

Utilisation of Money composing Public Debt.

A statement is supplied, based on figures taken from the Colonial Treasurer's Budget of 1897 (to which the necessary additions have been made), showing the purposes for which the money forming the public debt of the colony was raised or voted.

But the amounts in the items must be regarded as only approximations to the actual facts. The information is merely indicative of the truth, and is a revision of what was given in the Year-book, 1899, which was found to be not as near to correctness as possible in places.

PUBLIC DEBT OF NEW ZEALAND, MARCH, 1904, SHOWING APPROXIMATELY THE AMOUNTS RAISED OR VOTED UNDER VARIOUS HEADS, ARRANGED IN THREE CLASSES.

	On 31st March, 1904. £
(*a.*) *Services*—	
Railways	18,660,000*
Lands improvement (roads and bridges)	5,700,000
Public works and buildings	4,340,000
Immigration	2,460,000
Maori war	2,360,000
Land-purchases	2,190,000
Defence	1,870,000
Telegraphs	990,000
Goldfields and coal-mines	790,000
Lighthouses and harbours	530,000
Midland Railway Company's bondholders	150,000
State coal-mines	100,000
Tourist and health resorts	30,000
(*b.*) *Investments*—	
Purchase of land for settlements	3,620,000
Advances to settlers	3,200,000
Loans to local bodies	2,180,000
Bank of New Zealand preference shares	500,000
New Zealand Consols	470,000
(*c.*) *Other*—	
Deficiencies in revenue, charges and expenses of raising loans, provincial liabilities, and miscellaneous expenditure	7,380,000

* NOTE.—Only a portion of expenditure of old Provincial Governments on railways became public debt of the colony. The total expenditure on railways (Provincial and General Government) to 31st March, 1904, was over twenty-two millions sterling, which includes £1,104,281 spent by the Provincial Governments, of which £82,259 was for the Dunedin and Port Chalmers line.

It will thus be found that on the 31st March, 1904, out of a total debt of £57,522,215, the amounts allocated for services formed approximately the following proportions of the whole :—

	Per Cent.		Per Cent.
For Railways	32·44	For Defence	3·25
„ Lands improvement (roads and bridges)	9·91	„ Telegraphs	1·72
„ Public works and buildings	7·55	„ Goldfields and coal-mines	1·37
„ Immigration	4·28	„ Lighthouses and harbours	0·92
„ Maori war	4·10	„ Midland Railway	0·26
„ Land-purchases	3·81	„ State coal-mines	0·18
		„ Tourist and health resorts	0·05

The total sum is divided into three classes in the table, of which (*a*) is composed of the various services above referred to, and the total of which forms 69·84 per cent. of the whole debt in 1904; class (*b*) consists of moneys devoted to what may be termed investments, being 17·33 per cent. of the total; (*c*) moneys paid away in charges and expenses of raising loans, also to meet deficiencies of revenue, besides old provincial liabilities, and miscellaneous expenditure, forming 12·83 per cent. of the debt.

The figures given as to railways do not include all the sums spent by the Provincial Governments, as stated in the note to the table, nor do the figures in some other items agree with those given elsewhere, made up from tables showing the expenditure out of the Public Works Fund, which, as previously explained, is augmented by contributions from the Consolidated Revenue Account.

Public Works in New Zealand.

The burden of a public debt depends greatly on the measure in which it is expended on reproductive works, and on the degree of prosperity enjoyed by the people. The generally rugged character of this country, and the natural difficulties appertaining to the sites of many of the towns, soon necessitated a large outlay on roads and public works. The need was fully recognised, and to some extent met, by the Provincial Governments, which have justly received great credit for their far-seeing and liberal exertions. A great deal of road-making, often of a very costly character, was accomplished, harbour and other improvements begun, and immigration encouraged. Some railways were made in Canterbury, Otago, and Southland. The City of Christchurch and the Canterbury Plains were connected with the Port of Lyttelton by a railway, which required the construction of a long and very costly tunnel through the intervening range of hills. In Otago private enterprise, backed by the guarantee of the Provincial Government, built a railway from Dunedin to Port Chalmers, and some miles of line were made in Southland from the Town of Invercargill into the interior; but no general and comprehensive scheme of public works could be carried out by the separate exertions of the Provincial Governments. In 1870, therefore, the General Government brought forward its public-works and immigration policy, by which it was proposed to raise a loan of ten millions for the construction of main trunk railways, roads, and other public works of importance to the colony as a whole, as well as for the promotion of immigration on a large scale, the expenditure to be spread over a period of ten years. This policy was accepted by the Legislature, and embodied in "The Immigration and Public Works Act, 1870."

The demands for local railways and other works soon caused the original proposals to be exceeded, and entailed an expenditure at a much more rapid rate and to a far greater amount than was originally contemplated. Although many of the works undertaken

have been directly unremunerative, yet the effect of the policy as a whole has been largely to develop the settlement of the country, and to increase enormously the value of landed property; land in parts which before the construction of railways was valued at from £1 to £2 per acre having been subsequently sold at prices varying from £10 to £20 per acre. Moreover, the railway and telegraph lines yield a revenue which covers a large portion of the interest on their cost after paying working-expenses.

Expenditure out of the Public Works Fund.

The net expenditure, under all heads, of the Public Works Fund from 1870 to the 31st March, 1904, can be given correctly, but this fund, as stated previously, is not altogether composed of money charged to the public debt. It had received £35,388,167 from loans and £4,720,842 by way of receipts in aid on the latter date. The money received by way of aid included £3,755,000 transferred from the Consolidated Fund during the last thirteen financial years, out of surplus revenue. Nearly forty millions sterling were spent since the year 1870 up to March, 1904, and the items given below exhibit the nature of the works, &c., with amount for each.

NET EXPENDITURE OF PUBLIC WORKS FUND FROM 1870 TO 31ST MARCH, 1904.

Expenditure on—	£
Immigration	2,147,994
Public works, departmental	507,126
Railways, including surveys of new lines	20,063,960
Roads	6,610,090
Land-purchases	2,004,365
Development of goldfields	742,170
Telegraph extension	1,053,692
Public buildings	3,068,896
Lighthouses, harbour-works, and defences	1,002,216
Contingent defence	772,563
Rates on Native lands	65,934
Thermal springs	14,600
Tourist and health resorts	37,852
Lands improvement	6,109
Charges and expenses of raising loans	1,238,304
Coal-mines	10,835
Interest and sinking fund	218,500
Payment to Midland Railway bondholders	150,000
Total	£39,715,206

Expenditure on Railways.

The railway expenditure during each of six quinquennial periods, and for the years ended 31st March, 1901 to 1904, since the initiation of the public-works policy, has been :—

	£
1st July, 1870, to 30th June, 1875	3,575,362
1st July, 1875, to 31st March, 1880	4,919,712
1st April, 1880, to 31st March, 1885	3,120,680
1st April, 1885, to 31st March, 1890	2,308,319
1st April, 1890, to 31st March, 1895	978,498
1st April, 1895, to 31st March, 1900	1,547,732
1st April, 1900, to 31st March, 1901	717,723
1st April, 1901, to 31st March, 1902	1,333,941
1st April, 1902, to 31st March, 1903	759,752
1st April, 1903, to 31st March, 1904	802,241
Total	£20,063,960*

New Zealand's expenditure on railways is, with one exception (that of Tasmania) the lowest per head of the population of any of the Australian States. The next table shows the cost of railway-works, the mileage, the average cost per mile, the population, and the cost per head of the population in New Zealand and the several States referred to :—

State or Colony.	Year ended	Cost of Construction of Open Lines.	Average No. of Miles of Line open.	Average Cost per Mile.	Estimated Population	Cost per Head of Population		
		£		£		£	s.	d.
Queensland ..	30 June, 1903	20,302,177	2,777	7,489	514,851	39	8	8
New South Wales	30 June, 1903	41,654,977	3,074	13,272	1,415,760	29	8	5
Victoria ..	30 June, 1903	40,974,493	3,335½	12,110	1,208,070	33	18	4
South Australia†	30 June, 1903	14,575,852	1,882	7,745	365,020	39	18	8
West'n Australia	30 June, 1903	8,141,782	1,434	5,678	221,990	36	13	7
Tasmania ..	31 Dec., 1902	3,840,747	462	8,317	177,077	21	13	9
New Zealand ..	31 Mar., 1904	20,692,911	2,305	8,977	882,097	23	9	2‡

In the foregoing table the cost per head of population for railway-construction is shown to have been between £33 and £36 in the States of Victoria and Western Australia; over £39 in South Australia and Queensland; in New South Wales it was over £29; but in New Zealand the cost has been £23, and in Tasmania over £21, per head of population.

Public Debt of Australasia.

The following figures, which, with the exception of those for New Zealand, are taken from Mr. Coghlan's Australasian Statistics, show the public debt of each State or colony in 1902–1903 :—

* Excluding £26,463 expended on the Paeroa–Waihi line during the year.
† Including Northern Territory. ‡ Maoris included.

State or Colony.	Date.	Public Debt.			Debt per Head of Population.
		Fixed Debt.	Floating Debt.	Total.	
		£	£	£	£ s. d.
Queensland ..	30 June, 1903	39,901,247	1,130,000	41,031,247	79 8 10
New South Wales	30 June, 1903	70,486,361	7,206,626	77,692,987	54 15 11
Victoria ..	30 June, 1903	50,397,900	1,050,000	51,447,900	42 13 8
South Australia ..	30 June, 1903	26,386,645	1,456,725	27,843,370	76 9 5
Western Australia	30 June, 1903	15,627,298	..	15,627,298	69 13 6
Tasmania ..	31 Dec., 1902	9,228,963	..	9,228,963	52 2 4
New Zealand ..	31 Mar., 1903	55,899,019	..	55,899,019	68 12 0*

* As shown previously (see page 445), the amount of accrued sinking fund reduces this by £2 16s. 9d. per head.

The amount of indebtedness per head of population in June, 1903, in Queensland, South Australia, and Western Australia was thus greater than that for New Zealand in March, 1903.

The Assets Realisation Board.

The Assets Realisation Board was established for the purchase, in connection with the affairs of the Bank of New Zealand, of all the assets of the Estates Company and of the Auckland Agricultural Company.

The following particulars are extracted from the General Manager's report for the year ended 31st March last (1904)—

Sales to the extent of £286,350 have been made, as compared with £138,498 the previous year. Of the total value (£286,350), £252,962 represents country, £8,863 town lands, and £24,525 stock, implements, &c., sold on properties finally realised.

The sales for the period 1895–1904, including stock, show a total of £1,250,028 received.

On 31st March, 1904, the proportion of total sales from time of starting to the book-cost of all estates (£2,731,706) was 45·76 per cent.; and to land-tax valuation, *plus* 10 per cent. for sundry properties, with the manager's valuation for station properties (which together total £1,895,179), it was 65·96 per cent.

Particulars of operations are—

	£
Sales of properties finally realised, 1895–1904 (including stock), (net amount)	700,975
Properties partially realised	549,053
	£1,250,028

The book-cost of the estates in respect of which the sales were finally closed was £1,017,031. These properties are shown above to have realised £700,975, leaving a deficiency of £316,056, including the realisation expenses, &c.

The localities of the sales are as follows :—

	Estates.	Farms.	Town Sections.	Suburban Sections.	£
Auckland ..	7	270	722	270	518,385
Canterbury ..	3	98	22	63	286,455
Hawke's Bay ..	2	..	10	..	104,250
Otago	2	10	636	182	75,202
Marlborough ..	1	4	65	6	20,414
Wellington ..	1	17	31	1	156,631
					1,161,337
Proceeds: realisation of sundry assets					8,419
Stock sales on properties finally realised					80,272
					£1,250,028

Special Banking Legislation.

A synopsis of "The Bank of New Zealand Act, 1903," is given previously on page 308.

SECTION XIX.—CROWN LANDS.

A SUMMARY of the transactions during the year ended 31st March, 1904, will be found in the following table, which shows under all descriptions of tenure the number of selectors and the area selected :—

Nature and Tenure of Lands selected during the Year ended the 31st March, 1904.	Selectors.	Area. A. R. P.	Number of Purchasers or Selectors.	Area. A. R. P.
Town lands sold for cash	196	202 2 13		
Suburban lands sold for cash ...	74	219 3 22	431	22,476 0 32
Rural lands sold for cash	161	22,053 2 37		
Occupation with right of purchase			402	146,952 3 37
Lease in perpetuity			489	102,370 3 27
Agricultural lease			2	13 1 0
Village settlement, cash			10	8 0 6
" occupation with right of purchase ...			1	0 1 0
" lease in perpetuity			21	513 2 5
Village-homestead special settlement			23	272 1 25
Special settlement associations			4	729 0 0
Improved-farm special settlement (lease in perpetuity and occupation with right of purchase)			106	19,435 3 14
Occupation leases, Mining Act			97	4,971 3 32
Small grazing-runs ,, ...			39	105,049 3 22
Pastoral runs			129	956,781 1 32
Miscellaneous leases and licenses			593	111,622 3 8
Cheviot Estate—				
Miscellaneous			2	6 1 0
Land for Settlements Acts—				
Cash lands			4	4 1 32
Lease in perpetuity			405	92,144 1 35
Small grazing-runs			19	39,735 3 0
Miscellaneous			34	22,045 1 28
			2,811	1,624,934 3 15
Endowments—				
Cash lands			6	4 2 0
Occupation leases, Mining Act			7	91 3 33
Lease in perpetuity			3	803 1 8
Small grazing-runs			1	644 2 7
Miscellaneous			91	1,156 1 28
Thermal Springs District leases			2	11 1 36
Totals			2,921	1,627,647 0 7

Particulars of the number of Crown tenants at present holding lands under the several tenures, together with the yearly rental payable, are given in the next statement.

STATEMENT showing the TOTAL NUMBER OF CROWN TENANTS, with Area selected or held, and the Yearly Rent payable, as on the 31st March, 1904.

Tenures.	Total Number of Tenants.	Total Area held by such Tenants.	Total Yearly Rental or Instalment payable.
		A. R. P.	£ s. d.
ORDINARY CROWN LANDS.			
Deferred payment	400	70,667 3 39	3,341 0 2
Perpetual lease	704	130,028 2 33	5,120 18 2
Occupation with right of purchase	3,989	1,107,128 1 2	39,510 8 1
Lease in perpetuity	4,004	1,038,867 2 16	36,972 4 4
Agricultural lease	18	562 2 37	31 3 3
Homestead	2	158 0 37	...
Mining Districts Land Occupation Act	471	20,313 0 12	1,181 0 6
Village settlements—			
Deferred payment	20	378 3 28	32 0 8
Perpetual lease	142	2,178 3 27	320 19 2
Occupation with right of purchase	38	2) 2 4	12 '9 2
Lease in perpetuity	458	6,718 3 25	623 12 4
Village-homestead special settlements—			
Perpetual lease	356	6,497 3 25	870 2 9
Lease in perpetuity	670	16,453 2 10	2,426 2 4
Special settlement associations—			
Perpetual lease	15	964 2 11	69 16 8
Lease in perpetuity	631	116,879 3 27	5,996 14 1
Improved-farm special settlements	558	69,328 3 16	3,101 7 4
Small grazing-runs	642	1,338,489 2 30	26,921 7 6
Pastoral runs	872	11,583,324 2 13	73,937 5 0
Miscellaneous leases	2,765	552,026 0 4	11,354 1 9
Totals	16,755	16,060,997 3 36	211,822 3 3
CHEVIOT ESTATE—			
Lease in perpetuity	119	24,403 1 9	6,501 5 0
Village-homestead special settlement	70	2,480 1 0	870 0 4
Grazing-farms	48	45,977 2 9	6,624 7 2
Pastoral runs	1	1,642 0 0	193 3 8
Miscellaneous	73	1,450 2 11	289 15 7
LAND FOR SETTLEMENTS ACTS—			
Lease in perpetuity	2,465	433,624 0 17	132,302 10 9
Lease in perpetuity, village	46	447 3 20	340 11 10
Special-settlement associations	11	2,114 1 9	162 7 8
Small grazing-runs	72	128,648 1 16	17,397 17 10
Pastoral runs	2	953 2 38	121 13 0
Miscellaneous	145	10,885 2 4	1,133 5 3
THERMAL SPRINGS (ROTORUA)	284	6,071 1 24	1,979 16 4
Grand totals	20,091	16,719,696 3 33	379,739 7 8
Endowments	729	165,182 3 5	8,389 19 0
Native townships	281	988 0 19	1,199 6 6

Tables I. and II., which follow, exhibit the acreage of land *taken up for settlement*, and the number of holdings under each description of tenure. The lands held under pastoral license and miscellaneous leases, such as for timber and flax-cutting, coal-mining, &c., *are not included* in these tables. Tables III. and IV. show the total acreage taken up year by year since 1894 in each land district, and the number of holdings grouped according to size, the areas varying from less than one acre in extent to 1,000 acres and over.

The forfeitures and surrenders in respect of the lands taken up for settlement (excluding, as already remarked, pastoral and miscellaneous leases) for the last eight years were :—

1896–97	815 holdings	228,978 acres.	1900–1901	354 holdings	106,690 acres.
1897–98	658 "	130,380 "	1901–1902	192 "	75,368 "
1898–99	567 "	180,957 "	1902–1903	329 "	106,300 "
1899–1900	510 "	164,003 "	1903–1904	354 "	105,625 "

Forfeited and surrendered lands are again thrown open for selection as soon as possible, and in the majority of cases are taken up again by fresh selectors within a short time.

A full description of the various tenures under which land is dealt with in the colony is given in the article entitled "The Land System of New Zealand," in Part III. of this book.

I.—Comparative Statement showing Acreage of Lands selected under Settlement Conditions (excluding Pastoral Runs, Miscellaneous Leases and Licenses, Endowments, and Thermal Springs District Leases) during each of the Years ended 31st March, 1894–1904.

——	1893-94.	1894-95.	1895-96.	1896-97.	1897-98.	1898-99.	1899-1900.	1900-1901.	1901-1902.	1902-1903.	1903-1904.
	Acres.	Acres.	Acres.	Acres.	Acres.	Acres.	Acres.	Acres.	Acres.	Acres.	Acres.
Cash lands	34,999	38,695	26,575	28,485	22,525	37,400	23,936	58,700	27,290	17,277	22,481
Deferred payments	12,669	5,454	456	..	..	13	..	..	52	..	..
Perpetual lease and small areas ..	3,854	1,263	1,427	9,106	651	640	624	2,499	10	..	..
Occupation with right of purchase ..	108,133	75,478	84,968	59,648	81,414	109,950	117,771	262,729	128,893	118,557	146,953
Lease in perpetuity	179,993	91,799	122,350	104,927	117,938	159,415	153,531	144,208	116,445	162,839	194,515
Agricultural lease	365	45	36	13	258	114	70	23	28	36	13
Occupation lease under "The Mining Districts Land Occupation Act, 1894"	..	..	2,931	2,817	1,285	1,449	2,295	2,123	2,644	2,485	4,972
Village settlement—											
Cash	2	24	9	4	1	30	4	22	10	9	8
Occupation with right of purchase	1	23	2	4	2	2	1	..	1	..	..
Lease in perpetuity	3,953	4,050	3,365	1,317	1,426	2,115	1,762	1,082	456	619	514
Village-homestead special settlement	2,550	2,743	793	360	42	134	31	376	469	1,512	272
Special-settlement associations (lease in perpetuity)	68,852	51,346	44,237	28,084	442	607	2	..	..	5,761	729
Special-settlement improved farms ..	..	9,731	28,348	4,882	9,007	4,823	7,393	1,936	1,618	4,032	19,436
Small grazing-runs and grazing-farms	252,693	117,846	46,407	68,934	149,458	77,632	155,109	86,076	128,060	116,567	144,786
Totals	668,064	398,497	361,904	308,581	384,449	394,324	462,529	559,774	405,976	429,694	534,679

Note.—The forfeitures and surrenders for the last eight of the years dealt with in the table were—for the year 1896-97, 228,978 acres; 1897-98, 130,380 acres; 1898-99, 180,957 acres; 1899-1900, 164,003 acres; 1900-1901, 106,690 acres; 1901-1902, 75,368 acres; 1902-1903, 106,390; and for 1903-1904, 105,625 acres. But it must not be supposed that these relate to the acreages taken up during the same years; on the contrary, forfeitures may have their origin in selections of long standing and various dates.

II.—Comparative Statement showing Number of Selectors of Land under Settlement Conditions (excluding Pastoral Runs, Miscellaneous Leases and Licenses, Endowments and Thermal Springs District Leases) during each of the Years ended 31st March, 1894–1904.

—	1893–4.	1894–5.	1895–6.	1896–7.	1897–8.	1898–9.	1899–1900.	1900–1901.	1901–1902.	1902–1903.	1903–1904.
	No.	No.	No.	No.	No.	No.	No.	No.	No.	No.	No.
For cash	497	392	476	388	272	534	491	363	489	381	435
Deferred payments	96	47	6	..	..	1	..	..	1	..	..
Perpetual lease and small areas	17	3	7	19	2	1	2	3	1	..	..
Occupation with right of purchase	461	398	431	277	380	458	395	673	447	403	402
Lease in perpetuity	612	372	696	659	599	675	647	489	502	579	894
Agricultural lease	5	2	3	2	5	2	3	1	1	3	2
Occupation lease under "The Mining Districts Land Occupation Act, 1894"	..	..	69	48	23	31	64	53	78	58	97
Village settlement—											
Cash	3	23	16	4	2	21	6	35	21	19	10
Occupation with right of purchase	5	30	3	4	2	3	3	..	1	..	1
Lease in perpetuity	203	232	193	102	92	106	80	97	33	40	21
Village-homestead special settlement	118	60	19	18	9	12	6	7	30	34	23
Special-settlement associations	290	262	238	142	5	5	1	..	..	29	4
Improved-farm special settlement	..	107	315	45	77	64	41	13	9	30	106
Small grazing-runs and grazing-farms	142	60	32	27	71	40	64	35	48	47	58
Totals	2,454	1,988	2,504	1,735	1,539	1,953	1,803	1,769	1,661	1,623	2,053

Note.—The forfeitures and surrenders for the last eight of the years dealt with in the table were—for the year 1896–97, 815 holdings; 1897–98, 658 holdings; 1898–99, 567 holdings; 1899–1900, 510 holdings; 1900–1901, 354 holdings; 1901–1902, 192 holdings; in 1902–1903, 329 holdings; and in 1903–1904, 354 holdings. See note to previous table as to the origin of these failures.

III.—Lands taken up under Settlement Conditions during each of the Years ended 31st March, 1895-1904 (exclusive of Pastoral Runs, Miscellaneous Leases and Licenses, Endowments, and Thermal Springs District Leases).*

Land District.	1894-95.	1895-96.	1896-97.	1897-98.	1898-99.	1899-1900.	1900-1901.	1901-1902.	1902-1903.	1903-1904.
	Acres.	Acres.	Acres.	Acres.	Acres.	Acres.	Acres.	Acres.	Acres.	Acres.
Auckland	99,313	67,831	49,522	56,295	90,160	78,677	201,355	108,761	153,741	134,375
Hawke's Bay	20,141	16,353	22,858	19,876	36,222	36,451	90,625	71,902	38,505	99,153
Taranaki	35,113	55,850	22,002	16,786	18,867	54,960	71,000	23,942	39,353	69,236
Wellington	49,586	79,478	63,801	48,909	63,746	41,387	48,530	14,301	15,048	25,432
Nelson	34,906	19,421	14,462	13,600	18,673	10,211	18,918	29,520	11,289	16,981
Marlborough	18,353	15,858	20,858	54,581	51,973	74,311	33,063	64,624	56,681	33,332
Canterbury	33,744	14,827	22,654	75,041	52,839	34,218	20,744	11,981	45,464	78,363
Westland	1,826	1,765	3,865	437	352	792	709	27,214	4,112	4,098
Otago	80,439	70,238	79,212	77,345	40,599	68,436	49,901	29,232	51,038	51,783
Southland	25,076	20,283	9,347	21,579	20,893	63,086	24,929	24,499	14,463	21,926
Totals.. ..	398,497	361,904	308,581	384,449	394,324	462,529	559,774	405,976	429,694	534,679

IV.—Holdings taken up under Settlement Conditions during each of the Years ended 31st March, 1895-1904 (exclusive of Pastoral Runs, Miscellaneous Leases and Licenses, Endowments, and Thermal Springs District Leases), classified according to Size.

Size.	1894-95.	1895-96.	1896-97.	1897-98.	1898-99.	1899-1900.	1900-1901.	1901-1902.	1902-1903.	1903-1904.
	No.	No.	No.	No.	No.	No.	No.	No.	No.	No.
Under 1 acre	256	259	154	103	293	345	158	195	187	363
1 to 50 acres	696	719	588	496	571	501	466	569	475	467
51 to 250 acres	757	1,198	709	616	633	492	522	475	498	624
251 to 500 acres	169	232	178	197	277	262	333	245	240	322
501 to 1,000 acres	70	70	84	63	128	116	181	113	158	190
1,001 acres and upwards ..	40	26	22	64	51	87	109	64	65	87
Totals.. ..	1,988	2,504	1,735	1,539	1,953	1,803	1,769	1,661	1,623	2,053

* See notes as to forfeitures and surrenders on previous tables I. and II.

The following is a statement of the gross amounts collected by Receivers of Land Revenue for the years 1902–1903 and 1903–1904 :—

	1902–1903. £	s.	d.	1903–1904. £	s.	d.
Territorial revenue	252,277	15	1	247,842	7	5
Lands for settlement	110,632	8	8	150,883	4	5
Cheviot Estate	14,609	9	9	13,779	12	1
State forests	3,870	14	10	16,726	3	5
North Island Main Trunk Railway	9,396	14	7	10,931	12	10
Thermal springs	77	4	9	24	2	9
Rotorua Town Council	1,846	2	0	1,772	14	0
Lakes Ellesmere and Forsyth ..	1,631	17	10	1,635	3	1
Crown-grant fees	804	1	6	826	7	4
Native townships	702	2	10	933	16	9
Mining district land occupation ..	911	10	9	943	10	6
Miscellaneous	1,550	6	7	1,366	17	7
Government loans to local bodies ..	28,301	7	4	27,195	4	10
Endowments	20,053	19	9	20,722	18	9
Survey vote	1,713	19	9	1,627	8	2
Totals	£448,379	16	0	£497,211	3	11

SECTION XX.—LAND FOR SETTLEMENTS.

A FULL description is given, in a special article belonging to Section 1, Part III., of the objects and method of the Land for Settlements Acts, under which the acquirement by Government is authorised, through purchase from private owners, of properties for subdivision into small farms to meet the want felt of Crown lands for disposal in places where they are specially in demand.

The report of the Chairman of the Board of Land Purchase Commissioners on the transactions for the twelve months ended the 31st March, 1904, states:—

About 81 estates were offered to the Government, aggregating 327,600 acres.

The Board of Land Purchase Commissioners held 29 meetings, at which 33 cases were considered, and recommendations were made that 25 estates, of an area of 191,056 acres, should be purchased.

The Government approved of offers being made for 22 of these estates, of an area of 185,801 acres.

The vendors accepted the offers made for 4, and 1 was taken compulsorily. The purchase of 3, aggregating 39,269 acres, costing £263,563, was completed during the year.

The purchase of 7 estates acquired in the previous year was also completed. They contain 57,880 acres, and cost £205,052.

The total transactions completed during the year are therefore 11 estates, of 97,149 acres, purchased for £468,615 10s. 10d.

There are 2 estates, containing 62,520 acres, to cost about £241,286, which have been acquired but not yet paid for.

Negotiations were in progress at the 31st March for the purchase of a number of other estates.

The account shows that during the year £164,502 9s. 5d. was received as rent and interest, and that £115,104 7s. 7d. was paid as interest, leaving a profit for the year of £49,398 1s. 10d.

The amount expended in the purchase of land up to the 31st March, 1904, is £2,939,156 for 615,255 acres, average price £4 15s. 7d. per acre (rural land £4 13s. 3d., and workmen's homes £27 2s. 3d. per acre). Roads and incidental expenses cost £171,537 (5s. 6d. per acre). The whole is therefore £3,110,693 for 615,255 acres, or about £5 1s. 1d. per acre.

The total sum paid to the 31st March as interest and charges on the money borrowed to purchase this land is £422,851 14s. 3d., and the amount received as rent, &c., is £589,111 4s. 8d. The apparent gain to the account is £166,259 10s. 5d., and this is included in the amount shown as in credit.

The amount at the credit of the account at the 31st March was £418,658 18s. 9d.

The probable liabilities at the beginning of the year were for the purchase of land £501,286, and for roads to lands already acquired £19,376—in all, £520,662.

The Compensation Court which was held in Blenheim in November last to deal with the Flaxbourne Estate adjourned to December, 1904, without making an award.

The Mount Vernon and Manga-a-toro Estates were not before the Court during the year. Mount Vernon was, however, disposed of in May, 1904. No Court has yet been fixed for Manga-a-toro. Summarising the transactions at the end of the year, it appears that there were:—

	Estates.	Acres.	Prime Cost.
			£
Purchased and opened for selection to 31st March, 1904	131	615,255	2,939,156
Acquired but not paid for nor opened for selection	2	62,520	241,286
There are also awaiting awards of Compensation Court	3	74,000	260,000 (approximate).

SUMMARY OF ALL LANDS OFFERED TO GOVERNMENT UNDER "THE LAND FOR SETTLEMENTS CONSOLIDATION ACT, 1900," AND HOW DEALT WITH, FROM 1ST APRIL, 1903, TO 31ST MARCH, 1904.

Land District where Land situated.	Number of Estates offered.	Area offered.	Area declined without going to Board.	Area not recommended by Board.	Area recommended by Board.	Area under Consideration.	Area withdrawn.	Total.
		Acres.	Acres.	Acres.	Acres.	Acres.	Acres.	Acres.
Auckland	9	62,525	61,275	..	1,250	..	..	62,525
Hawke's Bay	8	45,056	31,000	..	4,479	2,307	7,270	45,056
Taranaki	15	19,894	17,702	..	242	1,950	..	19,894
Wellington	19	40,607	2,629	1,800	195	35,983	..	40,607
Marlborough	1	296	..	..	296	..	..	296
Nelson	1	18,000	18,000	..	..	..	..	18,000
Canterbury	13	41,097	6,191	3,655	21,677	3,845	5,729	41,097
Otago	7	30,971	28,600	..	1,027	388	956	30,971
Southland	8	69,216	2,782	..	66,191	243	..	69,216
Total	81	327,662	168,179	5,455	95,357	44,716	13,955	327,662

SUMMARY OF ESTATES ACQUIRED UP TO THE 31ST MARCH, 1904, AND AMOUNTS OF PURCHASE-MONEY.

Name of Land District.	No. of Estates acquired before 31st March, 1903.	Areas acquired before 31st March, 1903.	No. of Estates acquired from 1st April, 1903, to 31st March, 1904.	Area acquired from 1st April, 1903, to 31st March, 1904.	Total Numbers of Estates to 31st March, 1904.	Total Area to 31st March, 1904.	Purchase-money.
		A. R. P.		A. R. P.		A. R. P.	£ s. d.
Auckland ..	13	37,017 3 18	1	12,480 0 19	14	49,497 3 37	142,360 2 4
Hawke's Bay ..	13	105,371 2 18	1	10,475 0 12	14	115,846 2 30	637,336 7 8
Taranaki ..	2	1,812 0 33	1	881 0 13	3	2,693 1 6	58,336 6 2
Wellington ..	11	24,867 0 16	1	1,623 0 9	12	26,490 0 25	185,182 18 1
Marlborough ..	7	68,135 2 0	1	245 3 11	8	68,381 1 11	171,419 17 1
Westland ..	2	5,124 3 26	..	..	2	5,124 3 26	8,343 2 2
Canterbury ..	52	174,363 1 22	3	70,894 3 1	55	245,258 0 23	1,255,222 17 10
Otago	17	67,047 1 17	1	542 1 13	18	67,589 2 30	392,821 10 6
Southland ..	5	34,373 1 18	..	..	5	34,373 1 18	88,132 15 9
Totals ..	122	518,113 1 8	9	97,142 0 38	131	615,255 2 6	2,939,155 17 7

The Secretary for Crown Lands and Surveyor-General's report to the Hon. the Minister of Lands on the condition and settlement of the lands acquired and handed over to his department under the before-mentioned Acts gives the particulars of the estates offered for selection as follows:—

The Chairman of the Board of Land Purchase Commissioners transferred to this Department the following eight estates: Bickerstaffe, on the Otamatea River, near Maungaturoto (Auckland District), containing 12,480 acres; Wigan, inland from Tologa Bay, north of Gisborne (Hawke's Bay District), with an area of 10,475 acres; Clandon, near Toko (Taranaki District), 881 acres; Normandale, adjoining the Lower Hutt (Wellington District), 1,623 acres; Rainford, north of Kaikoura (Marlborough District), 246 acres; Annan, north-east of Waiau, 32,652 acres, and Rosewill, inland from Timaru, 38,143 acres (Canterbury District); and St. Helen's, twelve miles from Oamaru (Otago District), 542 acres. Their aggregate area is 97,042 acres.

Very complete sectional and topographical surveys were made of the properties, which were followed by an elaborate detailed classification, estimation, and valuation of the lands and improvements comprised in each subdivision or allotment. This was effected by surveyors and agricultural and pastoral experts, and duly revised by the Land-tax Valuers; the estimated cost of all road, bridge, and drainage works was furnished by the Roads Department's engineers. The capital cost of each estate was ascertained by adding to the amount paid the former proprietors the whole of the expenses incurred in connection with the survey, construction of roads, classification and valuations of the lands, and, in addition, the interest on the purchase-money, land-tax, local rates, Court and other legal expenses, as well as the cost of advertising and the publishing of maps and pamphlets illustrative of the properties.

As the Department had in hand on the 1st April, 1903, other estates which had not been submitted for selection, the number of estates actually opened to application was 13, representing a total of 140,356 acres. With the exception of the Bickerstaffe Estate and 2 hamlets, the public as usual manifested great interest, flocked in numbers to inspect the lands, lodged applications, and attended the ballots, practically taking up all the holdings, as the greater portion of the lands which were unselected at the close of the financial year have now been taken up. The unallotted areas in the Longbush and Tablelands Settlements comprise the 2 homestead sections which are still in the occupation of the former lessees.

The net result is that 441 selectors secured 134,793 acres of these chosen properties, representing a capital value of £705,295, an average of about £1,600 per holding, and an annual rental of £35,765, affording facility for the employment and maintenance upon the land of, say, 2,200 souls, besides providing profitable occupation for a considerable number of others. If to the selections of 1903–1904 be added those made in preceding years, we obtain a total of 129 estates, on which are located 2,745 selectors who lease from the State 576,045 acres, assessed at £3,030,462, and yielding a revenue of £151,523 per annum. The average capital value of the holdings works out to about £1,110, and an annual rental of £59 10s. 5d. The population carried by the whole of the settlements established upon these reacquired lands amounts to 8,255, who own 2,076 dwellings. It will be observed that these producers already equal in number the population of a considerable town.

Canterbury, with 1,007 selections, comprising 242,586 acres, on which the annual rental of £66,695 is payable, is easily first as regards the number, area, and value of holdings under the Land for Settlements Acts; Hawke's Bay comes next with 364 holdings, containing 109,561 acres and £33,311 annual rental; Otago third with 470 selections of an aggregate area of 62,562 acres and rental of £20,704; Marlborough, with 194 holdings, 66,815 acres and £9,709 rental, is fourth, if area and value are the basis of comparison; Wellington comes next with 225 selections, 22,645 acres, and annual rental of £8,489; Auckland is sixth in the scale, with 228 holdings, 35,637 acres, and £5,530 rental; Southland and Westland follow with 98 and 33 holdings respectively; whilst Nelson does not possess any settlements on this system.

The reports of the Commissioners of Crown Lands and Rangers afford full and detailed information in regard to each settlement. Shortly stated, it may

be said that only six ordinary settlements and six hamlets are not in a satisfactory and prosperous condition. The area of unallotted lands is 29,530 acres; but it must be remembered that this includes balances of estates which were submitted for selection late in the year, which, as already indicated, have since been quitted to a large extent. It is anticipated that, as the opportunities for securing holdings on Crown and land-for-settlements estates grow less, more attention will be bestowed by would-be settlers upon the remnants of estates which they now reject.

A careful consideration of the reports and statistics furnished by the Commissioners leads to the conclusion that with the few exceptions previously mentioned the settlements have made fair to excellent progress during the period under review, that their condition is satisfactory, and that the future prospects of the tenants are, on the whole, most hopeful and encouraging. Every one interested in close settlement must view with satisfaction the results disclosed herein and agree that the Land for Settlements policy has resulted in the founding of numerous homes, provided the tenants with healthy, congenial, and profitable occupation, improved their condition in life, added to the material wealth of the community, and strengthened and consolidated the colony's position.

ESTATES OFFERED for SELECTION during the Year ending the 31st March, 1904, under "The Land for Settlements Consolidation Act, 1900."

Land District, and Name of Estate.	Area of Estate.	Number of Selectors.	Area unselected 31st March, 1904.	Annual Rental payable on Lands leased.	Date of Opening.
Auckland—	A. R. P.		A. R. P.	£ s. d.	
Waari ...	427 2 32	5	378 0 14	8 1 2	20 April, 1903.
Bickerstaffe ...	12,480 0 19	10	9,484 0 20	486 6 0	7 Dec., 1903.
Hawke's Bay—					
Argyll	33,705 1 30	60	1,650 0 0	8,171 2 10	23 June, 1903.
Wigan	10,072 1 37	16	462 2 0	2,652 4 6	15 Dec., 1903.
Taranaki—					
Spotswood ...	310 3 23	14	187 1 31	291 5 2	5 May, 1903.
Clandon	881 0 13	5	...	623 0 6	16 Nov., 1903.
Wellington—					
Longbush	3,021 3 26	6	318 2 18	727 1 6	16 June, 1903.
Tablelands ...	5,496 3 30	8	1,338 2 0	998 4 4	16 June, 1903.
Normandale ...	1,623 0 9	15	1,495 0 0	155 7 10	15 Dec., 1903.
Marlborough—					
Rainford	246 0 21	11	...	315 15 4	31 Aug., 1903.
Canterbury—					
Annan	32,858 2 33	37	...	5,129 10 2	15 June, 1903.
Rosewill	38,683 2 15	137	1,344 2 31	13,284 7 4	31 March, 1904.
Otago—					
St. Helens	547 3 20	3	...	224 11 0	29 June, 1903.
Totals ...	140,355 3 28	327	16,658 3 34	33,066 17 8	

The estates, &c., acquired in each district under the Land for Settlements Acts to the 31st March, 1904, are next shown :—

Name of Estate.	Area acquired and handed over by Board.	Name of Estate.	Area acquired and handed over by Board.
Auckland—	A. R. P.	Hawke's Bay—	A. R. P.
Opouriao	7,604 0 0	Raureka	427 2 0
Okauia	5,920 0 0	Elsthorpe	9,740 0 0
Rangiatea	4,004 0 0	Waimarie	430 2 10
Karapiro	2,335 0 24	Pouparae	337 3 4
Feucourt	7,105 3 5	Tomoana	111 3 38
Whitehall	8,959 0 0	Mahora	1,133 3 0
Cradock Hamlet	33 0 9	Willows	775 1 36
Hetana Hamlet ...	451 1 34	Hatuma	26,522 3 20
Kitchener Hamlet	26 3 35	Manga-a-toro	19,581 3 12
Methuen Hamlet	77 3 14	Kumeroa	3,774 2 38
Plumer Hamlet	74 0 0	Forest Gate	8,822 0 13
Waari Hamlet	427 2 32	Argyll	33,705 1 30
Bickerstaffe	12,480 0 19	Wigan	10,072 1 37
	49,499 0 12		115,436 1 38

Estates, &c., acquired in each District under the Land for Settlements Acts to the 31st March, 1904—*continued.*

Name of Estate.	Area acquired and handed over by Board. A.	R.	P.
Taranaki—			
Tokaora	1,505	2	8
Spotswood	310	3	23
Clandon	881	0	13
	2,697	2	4
Wellington—			
Paparangi	322	3	32
Ohakea	1,745	1	30
Te Matua	702	0	19
Aorangi	1,785	0	0
Langdale	9,405	0	0
Mangawhata	1,240	2	36
Epuni Hamlet	100	3	14
Maungaraki	472	1	20
Linton	551	1	36
Longbush	3,021	3	26
Tablelands	5,496	3	30
Normandale	1,623	0	9
	26,467	3	12
Marlborough—			
Blind River	5,507	0	0
Omaka	3,898	0	0
Puhipuhi	320	0	0
Starborough	35,906	0	0
Richmond Brook	5,854	0	0
Waipapa	3,755	2	0
North Bank	12,895	0	0
Rainford	246	0	21
	68,381	2	21
Westland—			
Poerua	3,230	1	6
Kokatahi	1,894	2	20
	5,124	3	26
Canterbury—			
Pareora	620	2	13
Studholme Junction	109	0	7
Kapua	574	1	22
Rosebrook	600	1	8
Otaio	373	3	14
Patoa	4,535	3	14
The Peaks	2,811	0	9
Roimata	48	3	27
Kereta	105		29
Braco	27	2	4
Epworth	21	0	3
Ashley Gorge	1,165	3	6
Omihi Valley	20	0	0
Orakipaoa	384	0	31
Highbank	9,121	3	8
Otarakaro	39	3	9
Wharenui	73	1	10
Rakitairi	3,526	1	26
Waiapi	1,124	2	36
Horsley Down	3,982	3	35
Albury	19,539	1	24
R.S. 1862	20	0	0
" 2682	6	2	4
" 36469	154	3	2
" 36231	98	3	30
" 36056 and 36057	58	0	16
" 36228	100	3	23
" 36278	618	2	0
" 30791 (part)	100	0	0
36226 "	46	1	26
Marawiti	2,028	2	33
Hekeao	2,254	2	11

Name of Estate.	Area acquired and handed over by Board. A.	R.	P.
Canterbury—*continued.*			
Pawaho	52	0	18
Waikakahi	48,262	2	34
Tamai	41	0	28
Takitu	9,713	0	37
Pareora No. 2	8,132	0	31
Rautawiri	113	0	7
Papaka	1,561	2	25
Punaroa	7,029	3	5
Lyndon	4,243	3	28
Kohika	3,864	1	10
Tarawahi	31	3	0
Raincliff	745	2	0
Puhuka	39	2	7
Kaimahi	100	2	1
Kapuatohe	49	3	37
Rapuwai	2,247	2	11
Lyndon No. 2	15,887	0	0
Maytown	391	3	32
Eccleston	1,246	1	5
Mead	5,914	3	17
Chamberlain	10,500	1	9
Annan	32,858	2	33
Rosewill	38,683	2	15
	246,005	2	30
Otago—			
Pomahaka Downs	7,478	2	2
Teanaraki	351	0	39
Tahawai	70	1	35
Maerewhenua	11,163	3	31
Puketapu	509	0	6
Ardgowan	4,267	3	28
Makareao	2,383	0	4
Makareao Extension	2,589	2	12
Momona	224	1	16
Toka-rahi	11,259	2	36
Janefield	147	0	2
Elderslie	11,618	2	4
Barnego	7,078	2	1
Earnscleugh	1,269	3	5
Windsor Park	3,821	2	16
Windsor Park No. 2	2,179	2	17
Duncan	633	2	3
St. Helen's	547	3	20
	67,594	0	37
Southland—			
Merrivale	9,998	0	0
Otahu	6,153	0	36
Beaumont	4,484	0	4
Kingway	2,253	2	8
Glenham	11,484	2	10
	34,373	1	18

SUMMARY.

Auckland	49,499	0	12
Hawke's Bay	115,436	1	38
Taranaki	2,697	2	4
Wellington	26,467	3	12
Marlborough	68,381	2	21
Westland	5,124	3	26
Canterbury	246,005	2	30
Otago	67,594	0	37
Southland	34,373	1	18
Totals	615,580	2	38

SECTION XXI.—GOVERNMENT VALUATION OF LAND AND ITS IMPROVEMENTS.

Results of the General Valuation made for March, 1898, and its Revision to March, 1904.

In the year 1896 an Act intituled the Government Valuation of Land Act was passed, providing for the appointment of a Valuer-General, and for the periodical valuation of all land in the colony. The Valuer-General is the Commissioner of Taxes for the time being. The valuations on the district roll are used for the assessment of land-tax, stamp duties, and duties on deceased persons' estates; for local rates, except in places where these are levied on the annual value; also, for the purposes of advances and investments on mortgage of land by the Post Office, Government Insurance Department, Public Trust Office, and Government Advances to Settlers Office.

The term "land" means and includes all lands, tenements, buildings, and hereditaments, whether corporeal or incorporeal, and also includes all chattel interests in land.

A certified copy of any entry in the district valuation-roll is supplied by the Department on payment of the prescribed fee.

The district valuation-roll continues in force until a fresh roll is made, but whilst in force it may be altered and amended from time to time. The rolls for rating purposes are supplied to local bodies by the Valuer-General on the request of the local authority. The aim is to insure a standard valuation for taxation, local rating, and loan purposes.

Owners and occupiers dissatisfied with their valuations have the right of objection, the procedure being that laid down by "The Rating Act, 1894," and the regulations under "The Government Valuation of Land Act, 1896."

The cost of making the valuation is divided proportionally between the Departments mostly using it and the local authorities, while separate fees are provided for by regulation for supplying individual valuations to persons requiring them.

The district valuation-roll shows the capital value of the property, of improvements, and the unimproved value of the land.

The surface-value only of gold mines is included, and the value of the Government railways has been excluded.

All land is included, whether occupied or unoccupied, whether owned by private individuals, by the Crown, by Natives, by local authorities, Education Boards, School Commissioners, Churches, corporations, companies, or societies of all kinds, and whether subject to or exempt from taxation or rates.

The result of the general valuation of land as in March, 1898, is given in the report of the Valuer-General, presented to both Houses of Parliament. Since this general valuation a revision has been made in many districts, which brings the figures as corrected to represent the values on the 31st March, 1904. Comparative figures are here given for 1891 and 1904 showing the increase, and stating separately the unimproved value and the value of improvements.

Comparison of Capital Values, 1891 and 1904.

	1891.	1904.	Increase, 1891 to 1904.
	£	£	£
Unimproved value ..	75,787,895	112,629,412	36,841,517
Value of improvements	46,365,297	70,166,829	23,801,532
Total ..	£122,225,029*	£182,796,241	£60,571,212*

* In several cases the unimproved value, together with the value of improvements, does not equal the capital value. This is chiefly owing to alterations made by Assessment Courts.

In the figures for the North and South Islands the relative degree of increase is exhibited, and the rapid rate of progress in the North Island shows in strong contrast to that of the other Island. There has been great spread of settlement in the Wellington and Taranaki Districts.

Capital Values.

	1891.	1904.	Increase.
	£	£	£
North Island ..	57,441,115	101,924,877	44,483,762
South Island ..	64,783,914	80,871,364	16,087,450
Totals ..	£122,225,029	£182,796,241	£60,571,212

The increase for the North Island of £44,483,762 represents an advance of 77·44 per cent. on the value in 1891, and that of £16,087,450, for the South Island, 24·83 per cent. The increase for the whole colony, as shown previously, was £60,571,212, or 49·55 per cent.

The following statement gives the capital value of land and improvements in counties and boroughs as for 1891 and 1904.

Capital Value of Land and Improvements in Counties and Boroughs.

	1891.	1904.
	£	£
Counties	85,818,167	121,966,152
Boroughs	36,406,862	60,830,089
Totals	£122,225,029	£182,796,241

The increase in the capital value of land, with improvements, in counties for the thirteen years is £36,147,985, or 42·12 per cent., while that for boroughs is £24,423,227, or 67·08 per cent.; but the value of property in boroughs was added to between 1891 and 1904 by the constitution of fourteen new boroughs, and that of the counties correspondingly reduced, so that the actual rate of increase in the value of country lands is higher than indicated by the above figures, and in urban lands considerably less.

Comparisons for counties and boroughs are given in the two tables next following. Afterwards, the capital value of rateable property in counties, road and town districts, with an indication of the system of rating adopted by those local bodies. The rateable values can be used in connection with the information given in Section XV., "Local Governing Bodies," as to rates struck, &c.:—

COUNTIES, 1891 AND 1904.

TABLE showing the CAPITAL VALUE of LAND, with IMPROVEMENTS (and distinguishing the UNIMPROVED VALUE of LAND), in each COUNTY in NEW ZEALAND according to the Results of the General Valuation made in 1891, and as at 31st March, 1904:—

[* No valuation made. R signifies valuation revised since 1898.]

County.	Capital Value, Land and Improvements.		Unimproved Value of Land (included in previous columns).	
	As in Year 1891.	As at 31st March, 1904.	As in Year 1891.	As at 31st March, 1904.
	£	£	£	£
Mongonui	196,158	227,808	152,151	156,643
Whangaroa	63,825	76,966	41,379	47,108
Bay of Islands	365,069	R 418,336	247,612	R 266,706
Hokianga	422,365	R 439,798	365,957	R 348,568
Whangarei	523,420	R 708,079[a]	316,003	R 377,057[a]
Hobson	325,974	R 623,934	241,880	R 411,464
Otamatea	258,496	R 441,014	156,975	R 264,976
Rodney	293,235	R 332,704	173,313	R 155,228
Waitemata	632,012	R 806,129	388,568	R 444,842
Eden	2,002,677	R 3,411,337	991,380	R 1,772,273
Manukau	1,385,330	R 2,116,783	664,272	R 1,142,484
Islands (Great and Little Barrier)	55,284	61,732	42,574	39,621
Waiheke, &c. ..	71,343	87,021	40,211	45,005
Waikato	682,774	R 797,794	282,655	R 382,696
Raglan	357,941	R 753,647	280,945	R 471,042
Waipa	464,086	R 727,470	197,900	R 348,011
Kawhia	354,269	552,744	350,051	489,291
Coromandel	217,120	R 547,843	166,483	R 357,630
Thames	253,013	R 377,538	168,442	R 240,324
Ohinemuri	204,704	R 463,550[b]	164,182	R 267,631[b]
Tauranga	282,723	R 404,640†	172,078	R 265,324†
Piako	689,384	R 987,696[c]	427,889	R 527,738[c]
Rotorua	168,371	487,265	114,289	403,138
Whakatane	663,785	R 386,175[d]	548,221	R 318,075[d]
Opotiki	[e]	R 542,116	[e]	R 416,506
East Taupo	301,681	510,311	292,106	498,884
West Taupo	235,997	261,804	226,406	235,548
Islands (Mayor and Motiti)	*	5,780	*	3,696
Waiapu	472,548	R 1,002,545	341,062	R 577,148
Cook	1,885,856	R 3,482,678	1,175,712	R 2,129,113
Wairoa	1,101,072	R 1,384,645	786,032	R 915,554
Hawke's Bay	3,673,889	R 4,475,119	2,558,583	R 3,289,477

(a) Exclusive of Borough of Whangarei, which in 1891 formed part of county.
(b) Exclusive of Borough of Waihi, which in 1891 formed part of county.
(c) Exclusive of Borough of Te Aroha, which in 1891 formed part of county.
(d) Exclusive of County of Opotiki, which in 1891 formed part of the County of Whakatane.
(e) Formed part of Whakatane County.
† Approximate.

COUNTIES: CAPITAL VALUE OF LAND, ETC., 1891 AND 1904—*continued.*

[* No valuation made. R signifies valuation revised since 1898.]

County.	Capital Value, Land and Improvements.		Unimproved Value of Land (included in previous columns).	
	As in Year 1891.	As at 31st March, 1904.	As in Year 1891.	As at 31st March, 1904.
	£	£	£	£
Waipawa	2,179,812	R 3,171,017(f)	1,249,695	R 2,075,638(f)
Woodville	(g)	R 733,436	(g)	R 459,927
Patangata	1,863,936	R 2,060,952(h)	1,154,909	R 1,491,290(h)
Weber	(i)	R 303,188	(i)	R 162,690
Clifton	441,325	R 807,584	385,252	R 605,437
Taranaki	969,579	R 1,753,811(j)	604,091	R 1,023,747(j)
Egmont	(k)	R 976,900	(k)	R 586,186
Stratford	560,345	R 1,479,214(l)	447,502	R 898,265(l)
Hawera	1,247,436	R 2,792,994(m)	807,887	R 1,866,838(m)
Patea	823,675	R 1,383,399	522,322	R 849,008
Waitotara	731,668	R 1,058,812	460,842	R 698,532
Wanganui	1,176,106	R 1,529,499(n)	830,519	R 994,644(n)
Waimarino	(o)	R 698,499	(o)	R 584,690
Rangitikei	1,475,473	R 2,626,717	870,091	R 1,520,328
Kiwitea	(p)	R 1,105,206	(p)	R 653,104
Pohangina	(p)	R 572,821	(p)	R 333,414
Manawatu	810,171	R 1,198,277	445,416	R 853,518
Oroua	2,268,854	R 1,183,662(q)	1,298,417	R 771,353(q)
Kairanga	(p)	R 1,659,335	(p)	R 1,195,924
Horowhenua	858,648	R 1,864,114	551,248	R 1,198,431
Islands (Kapiti, Mana, and Somes)	*	17,984	*	13,378
Chatham Islands	*	95,557	*	55,838
Pahiatua	511,400	R 1,297,346†	331,634	R 738,551†
Akitio	(r)1,831,209	R 499,461	(r)1,057,393	R 304,710
Castlepoint ..		R 385,349		R 216,556
Eketahuna ..		R 547,230		R 295,515
Mauriceville ..		R 322,089		R 152,759
Masterton ..		R 1,810,237		R 1,085,594
Wairarapa South	1,872,035	R 1,123,621(s)	1,104,064	R 689,825(s)
Featherston	(t)	R 2,049,752	(t)	R 1,392,452
Hutt	1,030,745	R 1,956,982	520,005	R 1,099,678
Collingwood	323,910	R 206,224(u)	223,376	R 124,155(u)

(f) Exclusive of the County of Woodville and of Dannevirke Borough, which in 1891 formed parts of the County of Waipawa.
(g) Formed part of Waipawa County.
(h) Exclusive of Weber County, which in 1891 formed part of Patangata County.
(i) Formed part of Patangata County.
(j) Exclusive of the Borough of Inglewood and of a portion of Egmont County, which in 1891 formed parts of Taranaki County.
(k) Formed parts of the Counties of Taranaki and Hawera.
(l) Exclusive of the Borough of Stratford, which in 1891 formed part of county.
(m) Exclusive of the Borough of Eltham, which in 1891 formed part of county; also exclusive of a portion of the Egmont County.
(n) Exclusive of Waimarino County, which in 1891 formed part of Wanganui County.
(o) Formed part of Wanganui County.
(p) Formed part of Oroua County.
(q) Exclusive of Counties of Kiwitea, Pohangina, and Kairanga, which in 1891 formed parts of Oroua County.
(r) Late Wairarapa North County.
(s) Exclusive of Featherston County, which in 1891 formed part of Wairarapa South County.
(t) Formed part of Wairarapa South County.
(u) Exclusive of County of Takaka, which in 1891 formed part of County of Collingwood.
† Approximate.

COUNTIES: CAPITAL VALUE OF LAND, ETC., 1891 AND 1904—*continued*.

[* No valuation made. R Signifies valuation revised since 1898.]

County.	Capital Value, Land and Improvements.		Unimproved Value of Land (included in previous columns).	
	As in Year 1891.	As at 31st March, 1904.	As in Year 1891.	As at 31st March, 1904.
	£	£	£	£
Takaka	(v)	R 277,622	(v)	R 146,514
Waimea	1,196,226	R 1,598,219(w)	740,668	R 967,537(w)
Sounds	171,095	R 364,899	124,480	R 217,869
Marlborough	1,837,632	R 2,436,566	1,344,120	R 1,800,291
Kaikoura	350,521	R 553,488	209,082	R 408,637
Buller	651,129	R 574,840	483,407	R 337,319
Inangahua	874,948	R 856,627	598,963	R 616,171
Grey	861,890	R 808,738	670,528	R 627,337
Westland	1,048,156	R 809,675	964,461	R 669,219
Cheviot	486,765	R 707,388	413,852	R 561,212
Amuri	921,221	R 937,755	762,518	R 723,316
Ashley	3,801,341	R 4,341,455	2,861,083	R 3,398,861
Selwyn	7,446,756	R 8,335,784(x)	4,897,419	R 5,794,633(x)
Akaroa	1,169,379	R 1,315,487(y)	775,316	R 958,105(y)
Mount Herbert	(z)	R 211,580	(z)	R 150,396
Ashburton	3,630,383	R 5,041,270	2,691,466	R 3,919,733
Geraldine	3,257,696	R 2,148,433(x1)	2,316,183	R 1,694,723(x1)
Levels	(y1)	R 1,562,164	(y1)	R 1,197,386
Mackenzie	736,021	819,336	589,528	670,798
Waimate	2,462,433	R 2,915,603	1,968,587	R 2,418,579
Waitaki	2,709,379	R 2,904,184	2,060,640	R 2,297,621
Maniototo	449,650	568,061	358,342	370,564
Waihemo	417,887	R 462,802	277,792	R 313,047
Waikouaiti	602,015	R 691,304	309,077	R 379,212
Peninsula	414,146	R 534,479	193,301	R 308,358
Taieri	1,330,718	R 1,538,721	931,554	R 1,082,971
Tuapeka	938,701	R 919,812	642,394	R 612,502
Bruce	957,438	R 1,077,601	600,771	R 740,413
Clutha	1,151,046	R 1,309,156	772,352	R 873,054
Vincent	791,595	R 473,143	637,287	R 303,125
Lake	382,722	R 345,424	274,791	R 250,679
Fiord	*	144,425	*	137,645
Wallace	1,364,016	R 1,945,499	943,777	R 1,334,933
Southland	3,739,513	R 5,081,705(z1)	2,446,830	R 3,480,307(z1)
Stewart Island	85,021	R 161,307	79,690	R 135,007
Islands (Antipodes, &c.)..	*	13,880	*	13,880
Quarantine and Goat Is'ands	*	3,450	*	900

(v) Formed part of Collingwood County.
(w) Exclusive of Motueka Borough, which in 1891 formed part of county.
(x) Exclusive of Linwood, Woolston, and New Brighton Boroughs, which in 1891 formed part of county.
(y) Exclusive of Mount Herbert County, which in 1891 formed part of Akaroa County. Formed part of Akaroa County.
(x1) Exclusive of Levels County and Temuka Borough, which in 1891 formed part of county.
(y1) Formed part of Geraldine County.
(z1) Exclusive of Borough of Mataura, which in 1891 formed part of county.

Boroughs, 1891 and 1904.

Table showing the Capital Value of Land, with Improvements (and distinguishing the Unimproved Value of Land), in each Borough in New Zealand according to the Results of the General Valuation made in 1891, and as at 31st March, 1904.

[R signifies valuation revised since 1898.]

Borough.	Capital Value, Land and Improvements.		Unimproved Value of Land, (included in previous columns).	
	As in Year 1891.	As at 31st March, 1904.	As in Year 1891.	As at 31st March, 1904.
	£	£	£	£
Whangarei	(a)	R 161,503	(a)	R 61,491
Birkenhead	77,532	109,926	42,333	50,124
Devonport	407,333	598,364	163,468	243,176
Auckland	4,934,288	R 7,287,925	2,471,496	R 3,734,874
Parnell	366,098	464,841	138,775	193,547
Newmarket	182,353	220,940	82,327	94,802
Grey Lynn	222,355	R 578,943	135,607	R 274,698
Onehunga	250,634	293,069	111,406	140,404
Hamilton	90,142	R 289,141	44,584	R 183,443
Cambridge	70,279	88,587	25,521	27,821
Thames	227,171	295,783	76,547	115,314
Tauranga	63,026	89,230	25,153	30,240
Te Aroha	(b)	55,757	(b)	24,189
Waihi	(c)	R 187,450	(c)	R 64,667
Gisborne	317,989	R 527,297	148,511	R 312,173
Napier	1,275,853	1,294,497	667,157	585,570
Hastings	372,458	R 565,474	230,592	R 318,561
Dannevirke	(d)	R 367,241	(d)	R 227,147
Woodville	102,226	98,008	57,852	43,756
New Plymouth	341,117	R 987,127	165,621	R 616,423
Hawera	84,834	R 330,299	37,914	R 177,046
Patea	43,378	R 64,109	12,055	R 21,919
Stratford	(e)	R 312,621	(e)	R 158,552
Eltham	(f)	R 171,416	(f)	R 98,235
Inglewood	(g)	R 138,686	(g)	R 67,055
Wanganui	543,403	R 1,332,946	290,321	R 854,556
Marton	83,915	116,631	33,736	40,512
Feilding	146,884	R 333,566	68,199	R 167,520
Palmerston North ..	489,618	R 1,419,893	310,293	R 868,797
Foxton	85,743	R 121,579	39,755	R 61,509
Onslow	144,053	R 288,347	70,803	R 147,847
Karori	118,728	R 344,771	74,595	R 211,413
Wellington—				
City Ward	5,865,778	R 11,802,759	3,440,182	R 6,913,234
Melrose Ward	203,517	R 1,081,313	129,429	R 752,988
Pahiatua	(h)	R 149,102	(h)	R 71,737
Masterton	356,860	R 740,479	159,861	R 406,573
Carterton	88,650	R 170,652	31,315	R 82,172
Greytown	115,649	R 149,943	34,095	R 58,974

(a) Formed part of Whangarei County.
(b) Formed part of Piako County.
(c) Formed part of Ohinemuri County.
(d) Formed part of Waipawa County.
(e) Formed part of Stratford County.
(f) Formed part of Hawera County.
(g) Formed part of Taranaki County.
(h) Formed part of Pahiatua County.

BOROUGHS: CAPITAL VALUE OF LAND, ETC., 1891 AND 1904—*continued.*

[R signifies valuation revised since 1898.]

Borough.	Capital Value, Land and Improvements.		Unimproved Value of Land (included in previous columns)	
	As in Year 1891.	As at 31st March, 1904.	As in Year 1891.	As at 31st March, 1904.
	£	£	£	£
Lower Hutt	244,075	R 826,762	159,178	R 619,457
Petone	268,358	R 499,854	145,221	R 255,916
Richmond	84,285	R 99,022	43,375	R 53,813
Nelson	942,370	865,161	389,397	348,906
Picton	88,195	R 118,518	41,189	R 52,351
Blenheim	378,943	R 401,668	167,481	R 170,761
Motueka	(i)	R 139,661	(i)	R 84,922
Westport	166,987	199,919	57,782	82,586
Greymouth	299,077	R 543,615	114,543	R 183,240
Brunner	115,892	70,330	16,166	11,539
Kumara	33,565	R 34,575	6,945	R 6,072
Hokitika	102,708	R 168,693	18,054	R 66,008
Ross	16,961	R 21,006	5,250	R 5,413
Rangiora	158,017	189,719	71,161	74,980
Kaiapoi	134,055	164,416	47,023	48,517
Christchurch—				
Central Ward	3,403,566	R 4,627,411	1,820,770	R 2,282,830
St. Albans Ward ..	524,822	R 951,962	284,938	R 365,211
Sydenham Ward ..	821,060	R 1,117,303(l)	333,876	R 385,446(l)
Linwood Ward	(j)	R 704,584	(j)	R 237,991
Woolston	(j)	R 259,503	(j)	R 109,377
New Brighton	(j)	100,566	(j)	46,245
Sumner	102,145	R 165,680	60,246	R 85,509
Lyttelton	851,730	853,204	150,490	238,897
Akaroa	49,407	55,418	19,628	17,778
Ashburton	223,091	264,588	90,733	97,561
Temuka	(k)	R 123,443	(k)	R 37,388
Timaru	442,830	R 874,804	151,661	R 224,610
Waimate	75,399	R 142,282	18,759	R 51,658
Oamaru	612,571	R 531,719	279,113	R 179,223
Hampden	13,195	R 21,539	5,229	R 7,460
Naseby	24,186	34,249	2,440	4,174
Palmerston	51,182	R 58,756	16,771	R 14,354
Hawksbury	45,716	R 61,414	19,823	R 28,530
Port Chalmers	200,043	R 259,145	60,946	R 80,438
West Harbour	137,015	R 148,996	68,240	R 65,239
North-east Valley ..	276,835	R 365,354	130 271	R 155,471
Maori Hill	142,890	R 236,816	67,348	R 110,590
Roslyn	360,962	R 600,325	169,610	R 249,011
Mornington	284,875	R 388,266	125,414	R 152,443
Dunedin	4,193,422	R 5,441,582	2,124,467	R 2,565,904
Caversham	466,074	R 617,760	217,158	R 253,009
South Dunedin	223,534	R 469,363	82,609	R 142,141
St. Kilda	118,477	R 268,787	76,842	R 130,486

(i) Formed part of Waimea County.
(j) Formed part of Selwyn County.
(k) Formed part of Geraldine County.
(l) Value of railway-station (£80,000) included in 1891, excluded in 1898.

BOROUGHS: CAPITAL VALUE OF LAND, ETC., 1891 AND 1904—*continued.*

[R signifies valuation revised since 1898.]

Borough.	Capital Value, Land and Improvements.		Unimproved Value of Land (included in previous columns).	
	As in Year 1891.	As at 31st March, 1904.	As in Year 1891.	As at 31st March, 1904.
	£	£	£	£
Green Island	36,962	R 40,861	13,585	R 11,234
Mosgiel	122,625	R 166,683	53,441	R 65,200
Roxburgh	20,123	30,545	3,167	3,448
Lawrence	79,066	99,874	18,584	23,339
Tapanui	16,155	19,069	2,575	2,580
Milton	76,207	R 138,868	14,012	R 38,562
Balclutha	53,210	R 96,546	14,547	R 32,809
Kaitangata	54,976	62,520	21,133	28,037
Arrowtown	24,586	27,183	5,012	4,754
Queenstown	65,153	70,294	13,524	12,226
Cromwell	22,168	38,402	4,658	9,149
Alexandra	13,578	45,803	2,955	10,257
Gore	142,708	R 285,907	66,171	R 105,958
Mataura	(m)	R 128,001	(m)	R 50,111
Winton	20,195	R 49,829	7,965	R 19,613
Gladstone	26,541	39,790	13,825	16,140
Avenal	15,269	26,690	6,687	8,093
North Invercargill ..	28,293	R 50,492	15,640	R 20,312
East Invercargill	42,996	58,259	18,385	17,695
Invercargill	959,140	R 1,255,449	517,879	R 500,375
South Invercargill ..	79,526	R 118,253	42,813	R 45,038
Riverton	59,626	60,826	22,024	15,206
Campbelltown	97,380	R 201,992	49,430	R 89,132

(m) Formed part of Southland County.

Local Districts, 1904.

Table showing—(1.) Capital Value of Land, with Improvements (and distinguishing the Unimproved Value of Land), in each County, Riding, Road District, and Town District in New Zealand. (2.) Capital Value of Rateable Property, with Improvements (and distinguishing the Unimproved Value of Land), in each County, Riding, Road District, and Town District as at 31st March, 1904.

Note.—The rateable value of pastoral lands of the Crown is fixed, under section 2 of "The Rating Act, 1894," at the annual rental capitalised at 6 per cent., and in some cases is more and in some cases less than the assessed capital value of same.

[System of rating: C.V. signifies capital value, U.V. unimproved value, and A.V. annual value.]

County and Riding	Road District or Town District.	Gross Values.		System of Rating.	Rateable Values	
		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
		£	£		£	£
Mongonui—						
Kaitaia ..	..	53,901	36,172	..	46,271	30,727
Hohoura ..	..	39,677	23,340	..	24,356	14,991
Ororu ..	..	41,525	30,835	..	25,438	15,424
Mongonui ..	..	35,815	23,012	..	23,899	13,207
Victoria Valley ..	..	25,487	14,783	..	22,572	12,158
Herekino ..	..	31,403	28,501	..	15,326	12,662
Total of county	..	227,808	156,643	C.V.	157,862	99,169
Whangaroa—						
Whangaroa ..	..	25,088	15,387	..	15,008	7,685
Totara ..	..	20,102	12,697	..	14,040	7,480
Kaeo ..	..	31,776	19,024	..	23,477	12,262
Total of county	..	76,966	47,108	C.V.	52,525	27,427
Bay of Islands—						
Waimate ..	..	120,899	72,618	..	101,333	54,869
Russell ..	..	46,294	32,607	..	30,879	18,952
Kawakawa ..	..	87,718	40,449	..	67,320	25,098
Pakaraka ..	..	163,425	121,032	..	92,937	52,953
Total of county	..	418,336	266,706	C.V.	292,469	151,872
Hokianga—						
Whangape ..	..	58,785	48,853	..	26,047	19,485
Kohukohu ..	..	70,875	45,918	..	40,165	17,230
Waihou ..	..	70,501	62,104	..	37,865	30,663
Taheke ..	..	66,962	61,678	..	22,372	18,200
Horeke ..	..	23,711	18,159	..	20,760	15,228
Rawene ..	..	29,994	18,778	..	25,603	16,709
Omapere Waipoua	..	118,970	93,078	..	56,077	34,360
Total of county	..	439,798	348,568	U.V.	228,889	151,875

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

County and Riding.	Road District or Town District.	Gross Values.		System of Rating.	Rateable Values.	
		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
Whangarei—		£	£		£	£
Otonga ..	Otonga ..	21,968	9,178	C.V.	21,470	8,893
	Outlying ..	37,572	21,171	..	28,290	13,621
Kiripaka	Marua ..	31,156	20,054	C.V.	26,078	15,274
	Outlying ..	45,196	30,009	..	38,805	24,118
Hikurangi	Hikurangi ..	42,584	26,014	C.V.	41,135	25,673
	Kaurihohore	17,209	7,837	"	16,675	7,666
	Outlying ..	19,370	11,578	..	17,097	9,413
Wairua	Kamo T.D.	24,927	9,041	C.V	23,625	8,881
	Outlying ..	75,782	36,324	..	69,565	31,436
Maunu	Maunu ..	88,492	45,887	C.V.	82,689	43,626
	Outlying ..	56,826	34,163	..	46,304	24,499
Manaia	Whareora ..	11,335	6,258	C.V.	11,106	6,029
	Parua ..	25,222	11,815	"	22,768	10,528
	Outlying ..	29,921	16,183	..	26,627	13,183
Mangapai	Maungakaramea	31,336	12,877	C.V.	30,288	17,884
	Ruarangi ..	14,715	7,581	"	14,182	7,048
	Waikiekie ..	37,794	20,222	"	36,798	19,551
	Outlying ..	18,556	9,418	..	17,209	8,346
Waipu ..	Waipu North	21,331	9,748	C.V.	20,745	9,402
	Outlying ..	56,787	31,399	..	52,000	27,492
Total of county	..	708,079	377,057	C.V.	643,456	332,563
Hobson—						
Dargaville ..	..	83,951	52,656	..	77,710	47,040
Kaihu ..	..	50,760	36,333	..	46,865	32,438
Tangowahine ..	..	104,029	86,224	..	86,804	69,229
Wairoa ..	..	104,151	85,803	..	95,445	77,228
Okahu ..	..	78,025	47,377	..	76,645	46,766
Aratapu ..	..	112,256	56,046	..	108,323	54,470
Te Kopuru ..	..	90,762	47,025	..	63,468	27,610
Total of county	..	623,934	411,464	C.V.	555,260	354,781
Otamatea—						
Tokatoka ..	..	110,350	73,736	..	98,043	61,808
Matakohe	Matakohe ..	50,853	33,084	C.V.	49,616	32,250
	Outlying ..	14,060	8,965	..	13,699	8,704
Mareretu ..	Mareretu ..	26,076	13,828	C.V.	25,336	13,356
Paparoa ..	..	48,968	22,666	..	46,840	22,247
Wairau ..	..	51,388	27,405	..	50,673	27,296
Whakapirau ..	Whakapirau	72,197	45,697	Nil	37,414	20,667
Kaiwaka	Mangawai ..	24,747	13,150	C.V.	22,795	11,747
	Outlying ..	42,375	26,445	..	34,081	19,790
Total of county	..	441,014	264,976	C.V.	378,497	217,865

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

County and Riding.	Road District or Town District.	Gross Values.		System of Rating.	Rateable Values.	
		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
Rodney—		£	£		£	£
Albert	Albertland North	7,046	4,493	C.V.	6,482	4,141
	Outlying ..	7,083	3,823	..	6,583	3,323
	Albertland South	26,248	8,644	C.V.	24,775	8,222
	Wharehine	13,474	7,649	"	12,966	7,362
Hoteo ..	..	42,257	20,902	..	38,573	17,569
Tauhoa	Tauhoa	26,354	11,131	C.V.	24,989	10,385
	Komokoriki	11,993	6,893	"	9,685	4,729
	Ahuroa ..	6,038	3,613	"	5,845	3,545
Omaha ..	..	36,094	21,027	..	25,873	11,696
Matakana	Matakana West	18,648	6,907	C.V.	17,629	6,536
	Matakana East	9,216	5,394	"	9,150	5,347
	Eastern Mahurangi	11,373	4,694	"	10,128	4,009
Mahurangi	Outlying ..	33,946	14,823	..	32,423	13,905
	Warkworth	47,763	16,006	C.V.	45,333	15,549
Puhoi ..	Puhoi ..	35,171	19,229	"	33,982	18,855
Total of county	..	332,704	155,228	C.V.	304,416	135,173
Waitemata—						
Mairetahi	Helensville T.D.	27,323	5,143	A.V.	24,693	4,925
	Outlying ..	113,670	65,470	..	101,623	26,600
Kaukapakapa ..	Kaukapakapa	47,923	26,367	C.V.	44,768	23,825
Kumeu ..	..	42,513	24,300	..	40,513	22,478
Wainui	Whangaparaoa	8,036	4,041	C.V.	7,988	3,993
	Pukeatua ..	31,165	17,894	"	26,852	13,916
	Outlying ..	29,871	14,284	..	27,937	13,764
Takapuna ..	..	154,485	87,494	..	147,826	85,327
Birkenhead ..	..	52,852	32,464	..	50,264	30,504
Northcote ..	..	92,897	43,079	..	89,432	41,400
Waitakerei ..	..	98,670	62,532	..	91,896	57,469
Waikomiti ..	..	106,724	61,774	..	84,445	48,005
Total of county	..	806,129	444,842	C.V.	738,237	372,206
Eden—						
Newton ..	Arch Hill ..	104,895	40,638	A.V.	101,154	40,638
Grafton ..	Eden Terrace	153,839	62,759	C.V.	153,114	62,534
Whau	P'nt Chevalier	120,544	27,824	"	32,512	20,919
	Mount Albert	383,091	213,458	"	371,148	207,813
	Avondale ..	150,195	71,089	"	141,630	65,229
	Mount Roskill	232,474	173,618	"	224,404	170,048

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

County and Riding.	Road District or Town District.	Gross Values.		System of Rating.	Rateable Values.	
		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
Eden—*continued.*		£	£		£	£
	Mount Eden	689,069	260,292	C.V.	605,749	235,293
Epsom	Epsom ..	316,013	187,546	"	312,733	187,546
	One tree Hill	338,250	193,441	"	320,818	193,441
Parnell	Remuera ..	578,150	332,646	"	554,575	317,024
	Orakei ..	11,396	9,472	"	8,594	7,170
	Tamaki West	129,807	87,060	"	128,260	41,495
	Panmure Township	15,248	4,306	"	13,881	9,686
Tamaki	Mount Wellington	188,366	108,124	"	184,221	77,363
Total of county	..	3,411,337	1,772,273	Nil	3,152,793	1,636,199
Manukau—						
	Awhitu ..	38,597	18,932	C.V.	34,282	18,024
Awhitu	Pollok Settlement	14,536	6,815	"	14,126	6,732
Waiuku	Waipipi ..	196,124	108,667	"	188,809	104,494
	Waiuku ..	144,214	93,358	"	139,814	90,565
	Pakuranga ..	60,840	44,613	"	60,128	44,511
	Howick Township	16,687	6,258	"	15,724	6,065
Howick	Paparoa ..	22,311	11,085	"	21,967	10,997
	East Tamaki	109,376	53,383	"	107,546	53,083
	Turanga ..	27,324	12,070	"	26,586	12,044
	Maraetai ..	13,810	6,933	U.V.	13,542	6,898
	Otahuhu ..	110,765	51,424	C.V.	105,391	49,612
Otahuhu	Mangere ..	201,503	119,479	"	196,627	117,178
	Papatoitoi ..	60,231	39,860	"	58,992	39,575
	Manurewa ..	56,356	31,436	"	55,235	31,248
	Papakura ..	70,895	36,721	U.V.	69,984	36,700
	Wairoa ..	138,220	74,719	C.V.	133,358	71,712
Papakura	Drury ..	48,500	21,691	"	47,523	21,587
	Papakura T.D.	22,836	8,485	"	21,029	8,005
	Hunua ..	42,771	23,160	U.V.	41,687	22,556
	Mauku ..	86,630	47,221	C.V.	84,693	46,563
Pukekohe	Karaka ..	39,194	19,941	"	38,436	19,592
	Pukekohe W.	209,271	117,277	"	203,451	116,693
	Pukekohe E.	128,295	54,348	"	125,255	54,033
	Opaheke ..	54,882	23,439	"	53,222	23,354
	Paparata ..	46,623	19,743	"	45,088	19,234
	Pokeno ..	46,220	21,142	"	43,574	19,827
Maungatawhiri	Maungatawhiri	36,458	15,718	"	35,913	15,523
	Mercer ..	19,376	8,797	"	14,304	6,036
	Outlying ..	53,938	45,769	..	33,880	25,711
Total of county	..	2,116,783	1,142,484	Nil	2,030,166	1,098,152

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

County and Riding.	Road District or Town District.	Gross Values.		System of Rating.	Rateable Values	
		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
Islands—		£	£		£	£
Great Barrier Little Barrier	..	61,732	39,621	Nil	40,318	32,420
Kawau Motuhora Motutikatika Mokohinau Taranga Week's Island Tiritiri Waiheke Motutapu Ponui Rangitoto Motuihi Cuvier Great Mercury White Whale	..	87,021	45,005	Nil	73,774	39,011
Total of islands	..	148,753	84,626	Nil	114,092	71,431
Waikato—						
Whangamarino ..	Whangamarino	152,363	91,585	C.V.	129,191	75,128
Huntly ..	Huntly ..	125,060	67,554	"	109,381	54,041
Kirikiriroa ..	Kirikiriroa ..	271,179	100,470	"	262,061	95,471
Tamahere ..	Tamahere ..	88,074	42,480	"	83,086	38,292
Cambridge ..	Cambridge ..	161,118	80,607	"	159,103	80,192
Total of county	..	797,794	382,696	C.V.	742,822	343,124
Raglan—						
Onewhero ..	..	143,330	86,689	..	125,130	69,965
Whangape ..	..	167,344	106,947	..	140,718	82,301
Waingaro ..	..	134,401	74,021	..	122,744	62,831
Te Akau ..	Te Akau ..	107,789	87,658	Nil	105,255	85,357
Karioi ..	..	62,704	33,103	..	55,213	26,664
Whaingaroa ..	..	60,549	31,832	..	52,888	25,357
Karamu	Karamu ..	28,239	17,798	Nil	22,410	12,888
	Outlying ..	15,367	11,128	..	9,234	5,072
Pirongia ..	..	33,924	21,866	..	32,577	20,659
Total of county	..	753,647	471,042	U.V.	666,169	391,094
Waipa—						
Newcastle	Newcastle ..	78,698	42,795	C.V.	75,184	40,513
	Ngaruawahia T.D.	20,613	5,774	"	18,768	5,069

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

County and Riding	Road District or Town District.	Gross Values.		System of Rating.	Rateable Values	
		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
Waipa—*continued.*		£	£		£	£
Hamilton ..	..	98,744	50,470	..	98,232	49,983
Tuhikaramea ..	Tuhikaramea	45,340	25,993	C.V.	45,145	25,848
Pukekura ..	Pukekura ..	186,640	91,614	"	184,316	91,097
Mangapiko ..	..	125,940	56,898	..	122,565	55,423
Rangiaohia	Rangiaohia	124,291	57,826	C.V.	122,106	57,641
	Te Awamutu T.D.	31,206	11,616	"	27,699	10,926
	Kihikihi T.D.	15,998	5,025	"	13,662	4,709
Total of county	..	727,470	348,011	C.V.	707,677	341,209
Kawhia	..	552,744	489,291	Nil	331,080	269,469
Coromandel—						
Harataunga ..	..	247,127	162,218	..	173,497	98,721
Mercury Bay ..	..	300,716	195,412	..	56,403	38,091
Total of county	..	547,843	357,630	C.V.	229,900	136,812
Thames—						
Hastings ..	..	72,822	57,359	..	61,363	48,042
Kauaeranga ..	..	48,456	15,511	..	41,761	13,736
Parawai ..	..	42,333	17,855	..	36,943	16,440
Totara ..	..	213,927	149,599	..	162,927	105,960
Total of county	..	377,538	240,324	C.V.	302,994	184,178
Ohinemuri—						
Waitoa ..	..	107,158	83,846	..	62,720	40,928
Paeroa ..	..	212,698	118,221	..	168,988	81,744
Waitekauri ..	..	48,162	31,848	..	24,352	9,478
Karangahake ..	..	95,532	33,716	..	71,191	21,701
Total of county	..	463,550	267,631	C.V.	327,251	153,851
Tauranga—						
Katikati	Katikati ..	60,917	38,708	U.V.	47,906	26,272
	Outlying ..	18,955	17,084	..	6,271	4,871
Te Puna	Te Puna ..	39,960	30,428	U.V.	27,801	18,454
	Outlying (Te Puna Township)	1,759	879	..	1,587	752
Waimapu ..	..	90,689	59,769	..	71,620	42,011
Maketu	Te Puke* ..	86,656	53,346	U.V.	66,098	34,151
	Outlying ..	105,704	65,110	..	86,740	48,510
Total of county*	..	404,640	265,324	U.V.	308,023	175,021

* Approximate.

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

County and Riding.	Road District or Town District.	Gross Values.		System of Rating.	Rateable Values.	
		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
		£	£		£	£
Piako—						
Waitoa ..	Waitoa ..	414,601	211,076	C.V.	392,512	193,764
Te Aroha ..	..	87,256	53,059	..	78,646	46,429
Matamata ..	Matamata ..	164,589	90,854	C.V.	148,123	74,878
Taotaoroa ..	..	54,786	32,687	..	54,390	32,652
Patetere ..	..	266,464	140,062	..	235,516	109,194
Total of county	..	987,696	527,738	C.V.	909,187	456,917
Rotorua—						
North ..	..	235,305	190,111	..	54,649	35,102
South ..	..	251,960	213,027	..	144,192	109,002
Total of county	..	487,265	403,138	Nil	198,841	144,104
Whakatane—						
Matata ..	..	119,053	102,425	..	64,254	49,224
Omataroa ..	..	96,013	69,130	..	76,214	52,669
Opourīao ..	..	125,243	111,018	..	45,953	33,478
Waimana ..	..	45,866	35,502	..	36,084	25,934
Total of county	..	386,175	318,075	C.V.	222,505	161,305
Opotiki—						
Waioeka ..	..	453,173	368,123	..	230,416	150,386
Ohiwa ..	..	30,731	16,665	..	25,177	11,142
Opotiki	Opotiki T.D.	58,212	31,718	C.V.	52,701	29,575
Total of county	..	542,116	416,506	C.V.	308,294	191,103
East Taupo	..	510,311	498,884	Nil	323,065	311,638
West Taupo ..	..	261,804	235,548	Nil	86,248	60,839
Mayor and Motiti Islands	..	5,780	3,696	Nil	2,200	956
Waiapu—						
Matakaoa ..	..	93,472	78,728	..	32,638	18,826
Awanui ..	..	86,370	61,678	..	55,015	35,456
Piritarau ..	..	297,127	162,944	..	248,940	117,651
Waipiro ..	..	258,986	139,084	..	242,050	123,886
Tokomaru ..	..	266,590	134,714	..	209,380	78,451
Total of county	..	1,002,545	577,148	C.V.	788,023	374,270
Cook—						
Tolago ..	..	508,539	297,344	..	422,047	224,812
Waikohu	Waikohu ..	374,370	229,105	C.V.	303,562	161,739
	Waipaoa ..	137,429	70,543	"	135,597	68,711
	Ngatapa ..	414,493	262,779	"	378,182	227,829

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

County and Riding	Road District or Town District.	Gross Values.		System of Rating.	Rateable Values	
		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
Cook– *continued.*		£	£		£	£
Waimata	Waimata ..	234,722	125,924	C.V.	202,018	94,948
	Pouawa ..	178,192	97,147	"	177,792	96,747
Gisborne	Ormond ..	111,350	74,025	"	106,759	72,688
	Poverty Bay	235,379	167,424	"	225,899	160,064
	Taruheru (Subdivisions 1, 2)	77,957	55,122	"	76,352	54,106
Whataupoko	Taruheru (Subdivision 3)	52,135	25,788	"	52,135	25,788
	Whataupoko	117,443	49,218	"	117,246	49,089
	Kaiti ..	103,480	60,885	"	102,151	59,608
	Titirangi ..	33,679	27,066	"	30,313	24,244
Patutahi ..	Patutahi ..	312,435	220,339	"	301,271	211,285
Hangaroa	Hangaroa ..	73,301	44,751	"	48,882	20,376
	Outlying ..	112,808	84,167	..	75,348	47,189
	Aroha ..	75,787	40,234	C.V.	73,485	38,017
Arai	Arai ..	329,179	197,252	"	278,335	153,225
Total of county	..	3,482,678	2,129,113	C.V.	3,107,374	1,790,465
Wairoa—						
Waikaremoana ..	..	618,337	409,511	..	532,324	329,425
Clyde	Clyde T.D.	58,190	29,344	C.V.	51,638	26,395
	Outlying ..	280,473	184,876	..	237,902	143,755
Mohaka ..	..	427,645	291,823	..	347,672	218,098
Total of county	..	1,384,645	915,554	C.V.	1,169,536	717,673
Hawke's Bay—						
Petane ..	..	329,078	213,354	..	323,176	208,719
Puketapu ..	..	450,534	311,779	..	448,268	310,128
Okawa ..	..	604,650	428,836	..	559,336	392,284
Meanee	Taradale T.D.	67,652	34,341	C.V.	65,667	34,185
	Outlying ..	200,890	128,306	..	193,733	126,838
Erewhon ..	..	478,341	411,733	..	422,006	360,203
Maraekakaho ..	..	454,248	317,352	..	440,785	305,457
Heretaunga ..	..	780,865	583,861	..	777,217	581,883
Clive	..	377,150	292,655	..	361,666	280,129
Havelock ..	..	731,711	567,260	..	728,493	566,218
Total of county	..	4,475,119	3,289,477	C.V.	4,320,347	3,166,044
Waipawa—						
Hampden	North Ruataniwha	409,890	288,827	U.V.	408,289	288,626
	Outlying ..	57,249	26,924	..	49,659	19,654
Waipawa	Waipawa ..	63,038	42,170	U.V.	63,008	42,150
	Waipawa T.D.	96,399	47,063	"	89,584	45,068

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

County and Riding.	Road District or Town District.	Gross Values.		System of Rating.	Rateable Values.	
		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
Waipawa—*continued.*		£	£		£	£
Takapau	Takapau ..	339,909	223,254	U.V.	337,339	222,607
	Outlying ..	183,093	102,917	..	178,123	98,498
Ruataniwha ..	..	338,235	218,774	..	328,619	210,700
Waipukurau ..	Waipukurau	393,778	264,709	U.V.	372,327	256,608
Norsewood ..	Norsewood ..	257,559	157,162	„	244,090	146,258
Ormondville	Ormondville T.D.	36,564	10,406	„	32,055	9,463
	Outlying ..	173,844	97,204	..	167,165	91,121
Dannevirke ..	..	361,283	275,440	..	322,269	237,007
Mangatoro ..	..	460,176	320,788	..	455,888	316,910
Total of county	..	3,171,017	2,075,638	U.V.	3,048,415	1,984,670
Woodville—						
Woodville ..	..	178,894	105,674	..	177,701	104,975
Maungaatua ..	..	159,192	109,232	..	157,636	107,711
Kumeroa ..	..	215,553	122,816	..	207,865	117,790
Maharahara ..	..	179,797	122,205	..	176,713	119,523
Total of county	..	733,436	459,927	U.V.	719,915	449,999
Patangata—						
Patangata	Patangata ..	171,064	118,790	C.V.	170,816	118,777
	Kaikora N. T.D.	25,942	11,293	A.V.	25,192	11,178
Oero	Oero ..	372,407	286,385	C.V.	371,840	285,973
Tamumu ..	Tamumu ..	600,164	444,454	„	599,543	443,933
Eparaima	Wanstead ..	147,963	107,015	„	147,756	106,911
	Wallingford	380,368	265,799	„	379,660	265,381
Porangahau ..	Porangahau	363,044	257,554	„	357,522	253,837
Total of county	..	2,060,952	1,491,290	C.V.	2,052,329	1,485,990
Weber—						
Weber ..	..	98,470	53,703	..	98,088	53,627
Ti-tree Point ..	..	85,626	49,441	..	84,596	48.435
Wimbledon ..	..	119,092	59,546	..	118,578	59,420
Total of county	..	303,188	162,690	C.V.	301,262	161,482
Clifton—						
Mokau ..	..	412,508	354,709	..	225,630	169,433
Urenui ..	..	103,729	66,606	..	91,273	55,623
Tikorangi ..	..	76,596	45,895	..	70,668	41,314
Waihi ..	..	80.323	57,138	..	61,550	40,665
Ngatimaru ..	..	134,428	81,089	..	108,519	55,722
Total of county	..	807,584	605,437	C.V.	557,640	362,757

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

County and Riding	Road District or Town District.	Gross Values.		System of Rating.	Rateable Values	
		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
Taranaki—		£	£		£	£
Waitara	Waitara West	189,001	108,920	C.V.	176,897	98,345
	Raleigh T.D.	49,857	19,159	"	46,768	17,353
	Egmont ..	137,275	78,806	"	128,601	71,939
	Henui ..	118,476	79,589	"	113,030	75,182
Moa	Moa ..	465,785	230,510	"	462,491	229,539
	Mangorei ..	53,402	34,539	"	52,978	34,245
	Waiwakaiho	71,311	38,920	"	69,307	37,260
Omata	Elliott ..	55,281	39,035	"	54,424	38,391
	Carrington	100,211	64,563	"	99,711	64,256
	Frankley ..	73,139	45,524	"	73,018	45,504
	Barrett ..	115,152	77,303	"	113,433	76,131
	Omata ..	90,939	63,866	"	77,103	51,032
	Upper Hurford ..	14,648	8,627	"	14,463	8,623
	Tataraimaka	36,790	21,383	"	36,223	21,362
	Oakura ..	77,718	50,983	"	71,915	45,580
	Werekino ..	23,242	14,765	"	22,888	14,411
	Okato ..	81,584	47,255	"	79,183	45,984
Total of county	..	1,753,811	1,023,747	C.V.	1,692,433	975,137
Stratford—						
North ..	Manganui ..	392,788	215,514	U.V.	388,989	214,077
East	..	434,164	257,013	..	419,859	243,306
Ohura ..	..	221,519	151,838	..	164,680	96,999
West	..	212,830	133,977	..	209,183	131,034
South.. ..	..	217,913	139,923	..	216,800	139,566
Total of county	..	1,479,214	898,265	U.V.	1,399,511	824,982
Egmont—						
Rahotu ..	Parihaka ..	631,539	381,642	C.V.	615,507	371,456
Opunake ..	Opunake T.D.	73,497	39,217	C.V.	63,226	35,242
Oeo	..	271,864	165,327	..	261,053	157,177
Total of county	..	976,900	586,186	C.V.	939,786	563,875
Hawera—						
Waimate	Waimate ..	810,466	540,596	C.V.	766,494	506,768
	Manaia T.D.	39,790	14,078	"	35,316	13,046
Mangatoki ..	..	346,544	229,980	..	345,251	229,298
Okaiawa ..	..	256,413	188,642	..	230,903	168,633
Eltham ..	..	273,887	168,625	..	255,779	151,336
Hawera	Normanby T.D.	27,284	11,003	U.V.	25,568	10,692
	Outlying ..	764,353	528,048	..	717,025	496,872
Mokoia ..	..	274,257	185,866	..	256,786	172,122
Total of county	..	2,792,994	1,866,838	C.V.	2,633,122	1,748,767

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

County and Riding	Road District or Town District.	Gross Values.		System of Rating.	Rateable Values.	
		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
Patea—		£	£		£	£
Otoia	Patea West	361,980	230,183	C.V.	356,022	226,131
	Patea East	210,812	138,714	"	198,233	127,183
	Outlying ..	4,458	4,458	..	1,648	1,648
Kapara ..	..	137,748	81,972	..	106,719	51,410
Waverley	Kohi ..	72,286	44,934	C.V.	71,969	44,894
	Wairoa ..	84,516	51,568	"	80,220	47,272
	Motoroa ..	37,868	20,908	"	36,249	19,576
	Waitotara Momohaki	164,795	82,801	"	153,081	77,256
	Okutuku ..	79,861	54,590	"	79,861	54,590
	Whenuakura Waitotara	196,186	129,048	"	195,921	128,842
	Waverley T.D.	32,889	9,832	"	29,218	9,172
Total of county	..	1,383,399	849,008	C.V.	1,309,141	787,974
Waitotara—						
Tokomaru ..	..	160,778	114,641	..	67,558	22,751
Waitotara ..	..	343,426	242,809	..	330,842	234,317
Brunswick ..	..	304,688	199,655	..	300,252	198,001
Westmere ..	..	249,920	141,427	..	236,729	137,791
Total of county	..	1,058,812	698,532	C.V.	935,381	592,860
Wanganui—						
Mangawhero ..	Mangawhero	336,115	220,819	C.V.	280,444	168,488
Upper Wangaehu	Upper Wangaehu	523,478	324,238	"	413,877	217,144
Mataongaonga ..	Mataongaonga	214,682	161,559	"	214,182	161,309
Kaukatea ..	Kaukatea ..	75,690	46,459	"	75,486	46,451
Purua ..	Purua ..	211,240	129,297	"	209,574	129,021
Kaitoke ..	Kaitoke ..	168,294	112,272	"	160,318	107,529
Total of county	..	1,529,499	994,644	C.V.	1,353,881	829,942
Waimarino—						
Huikumu ..	..	191,861	162,551	..	103,442	75,563
Manganui ..	..	129,789	112,432	..	42,167	25,577
Ruapehu ..	..	66,660	56,570	..	26,663	17,263
Karioi ..	..	35,450	33,279	..	13,686	12,685
Parapara ..	..	118,552	88,974	..	70,656	45,123
Raetihi ..	..	32,682	19,688	..	26,017	14,843
Ohakune ..	..	123,505	111,196	..	68,592	59,662
Total of county	..	698,499	584,690	U.V.	351,223	250,716

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

County and Riding.	Road District or Town District.	Gross Values.		System of Rating.	Rateable Values.	
		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
Rangitikei—		£	£		£	£
Ohingaiti ..	..	593,796	334,007	..	511,575	268,387
Otairi ..	..	320,184	161,864	..	294,382	136,518
Maungahoe ..	..	184,996	103,388	..	183,365	102,178
Paraekaretu ..	..	295,749	170,564	..	291,253	168,368
Wangaehu ..	..	210,827	133,954	..	197,793	125,004
Maungaraupi ..	..	251,278	142,704	..	249,794	142,644
Porewa ..	..	264,028	143,965	..	261,795	143,577
Otakapu	Lethbridge T.D.	27,024	11,143	A.V.	25,081	10,831
	Outlying ..	264,958	182,481	..	264,485	182,352
Rangitoto	Bull's T.D.	38,948	11,790	A.V.	35,685	11,354
	Outlying ..	174,929	114,468	..	174,529	114,421
Total of county	..	2,626,717	1,520,328	C.V.	2,489,737	1,405,634
Kiwitea—						
Hautapu ..	..	133,583	79,988	..	124,624	71,489
Rangiwahia ..	..	148,705	84,895	..	140,713	77,587
Peep-o'-day ..	..	113,070	58,733	..	102,061	47,724
Ongo ..	..	120,507	73,862	..	118,555	72,015
Kiwitea ..	..	106,788	68,861	..	106,522	68,845
Waituna ..	..	116,484	69,913	..	115,727	69,716
Cheltenham ..	..	117,023	73,032	..	115,794	72,977
Kimbolton ..	..	112,031	60,693	..	108,506	58,575
Pakihikura ..	..	137,015	83,127	..	136,467	82,651
Total of county	..	1,105,206	653,104	C.V.	1,068,969	621,579
Pohangina—						
Mangapikopiko ..	..	90,399	49,750	..	89,131	49,114
Umutoi ..	..	92,292	57,728	..	77,464	42,940
Coal Creek ..	..	87,807	45,729	..	87,759	45,681
Tamaki ..	..	67,258	46,872	..	44,124	23,738
Pohangina ..	..	52,192	28,460	..	51,475	28,230
Mangaone ..	..	100,240	58,929	..	100,014	58,875
Awahou ..	..	82,633	45,946	..	76,501	39,924
Total of county	..	572,821	333,414	C.V.	526,468	288,502
Manawatu—						
Sandon ..	..	159,494	104,742	..	157,034	104,447
Mount Stewart ..	..	152,189	105,819	..	151,686	105,456
Waitohi ..	..	157,880	106,100	..	157,234	106,070
Campbell ..	..	198,777	137,064	..	195,985	136,257
Carnarvon ..	..	194,196	152,144	..	191 910	150,907
Kawakawa ..	..	170,495	120,810	..	170,125	120,798
Awahou ..	..	165,246	126,839	..	152,415	117,124
Total of county	..	1,198,277	853,518	C.V.	1,176,389	841,059

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

County and Riding.	Road District or Town District.	Gross Values.		System of Rating.	Rateable Values.	
		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
Otoua—		£	£		£	£
Rangitawa	Halcombe T.D.	21,443	5,428	A.V.	19,384	5,348
	Outlying ..	88,048	56,927	..	81,643	51,671
Mangaone ..	..	20,424	14,623	..	20,364	14,563
Raumanga ..	..	233,367	156,745	..	216,743	143,216
Makino ..	..	239,623	162,598	..	239,199	162,578
Taonui ..	..	277,361	188,300	..	276,056	188,077
Hiwinui ..	..	255,239	166,317	..	253,797	165,588
Otangaki ..	..	48,157	20,415	..	45,205	19,124
Total of county	..	1,183,662	771,353	C.V.	1,152,391	750,165
Kairanga—						
Taonui ..	..	1,153,778	858,774	..	1,136,525	846,302
Fitzherbert ..	..	505,557	337,150	..	492,778	325,419
Total of county	..	1,659,335	1,195,924	C.V.	1,629,303	1,171,721
Horowhenua—						
Tokomaru ..	..	443,550	280,596	..	437,203	276,141
Wirokino ..	..	804,603	554,326	..	743,920	508,290
Otaki ..	Otaki ..	334,649	190,298	C.V.	315,644	179,079
Te Horo ..	Te Horo ..	281,312	173,211	„	272,367	165,409
Total of county	..	1,864,114	1,198,431	C.V.	1,769,134	1,128,919
Chatham Islands ..	..	95,557	55,838	Nil	92,446	53,614
Islands—						
Kapiti .. / Mana .. / Somes ..	..	17,984	13,378	Nil	10,484	9,378
Pahiatua—						
Mangahao* ..	..	479,683	296,061	..	470,952	286,508
Pukemiku ..	..	157,278	94,548	..	152,107	92,550
Makuri ..	..	211,479	111,372	..	205,753	106,485
Mangaone ..	..	190,836	111,594	..	190,513	111,465
Puketoi ..	..	258,070	124,976	..	255,158	123,190
Total of county*	..	1,297,346	738,551	U.V.	1,274,483	720,198
Akitio—						
Akitio ..	..	151,193	91,429	..	149,343	89,739
Waihi ..	..	81,728	47,532	..	75,976	42,155
Rakaunui ..	..	40,538	25,264	..	35,939	20,758
Pongaroa ..	..	117,413	69,429	..	113,884	66,585
Mataikona ..	..	108,589	71,056	..	105,414	68,761
Total of county	..	499,461	304,710	C.V.	480,556	287,998

* Approximate.

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

County and Riding.	Road District or Town District.	Gross Values.		System of Rating.	Rateable Values	
		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
		£	£		£	£
Castlepoint—						
East	..	170,209	99,222	..	169,244	98,782
West	..	215,140	117,334	..	212,056	116,575
Total of county	..	385,349	216,556	C.V.	381,300	215,357
Eketahuna—						
West	..	286,746	161,563	..	276,270	152,346
East	..	260,484	133,952	..	254,241	131,941
Total of county	..	547,230	295,515	U.V.	530,511	284,287
Mauriceville—						
West	..	159,807	77,281	..	147,947	67,803
East	..	162,282	75,478	..	160,720	75,298
Total of county	..	322,089	152,759	C.V.	308,667	143,101
Masterton—						
Alfredton ..	..	259,626	114,690	..	250,781	107,143
Upper Taueru ..	..	166,760	90,943	..	166,583	90,901
Rangitumau ..	..	244,743	170,899	..	283,869	170,841
Opaki ..	..	412,770	243,855	..	393,655	229,219
Te Whiti ..	..	189,695	121,503	..	189,159	121,230
Wainuioru ..	..	536,643	343,704	..	529,677	338,920
Total of county	..	1,810,237	1,085,594	C.V.	1,813,724	1,058,254
Wairarapa South—						
Belvedere ..	..	198,133	114,320	..	183,058	100,794
Dalefield ..	..	183,566	112,342	..	181,725	111,740
Parkvale ..	..	194,566	122,403	..	191,252	122,203
Maungaraki ..	..	547,356	340,760	..	536,665	333,264
Total of county	..	1,123,621	689,825	U.V.	1,092,700	668,001
Featherston—						
Pahaoa ..	..	309,570	217,813	..	300,029	210,887
Greytown ..	..	294,213	206,529	..	280,096	193,432
Martinborough ..	..	213,254	132,472	..	208,952	131,558
Western Lake ..	..	137,761	103,629	..	126,022	92,134
Kahutara ..	..	258,892	195,612	..	247,250	185,926
Featherston	Outlying ..	137,019	87,806	..	134,612	85,609
	Featherston T.D.	60,285	16,576	C.V.	52,517	15,684
Otaraia ..	..	141,194	94,017	..	140,565	93,388
Turanganu ..	..	187,363	139,892	..	176,582	129,596
Awhea ..	..	310,201	198,106	..	291,782	179,970
Total of county	..	2,049,752	1,392,452	C.V.	1,958,407	1,318,184

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

County and Riding.	Road District or Town District.	Gross Values.		System of Rating.	Rateable Values.	
		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
		£	£		£	£
Hutt—						
Whareroa ..	..	174,910	86,972	..	167,658	80,309
Horokiwi	Outlying ..	180,816	78,074	..	179,260	77,678
	Plimmerton	19,541	7,631	C.V.	19,141	7,231
Porirua	Johnsonville T.D.	71,332	31,241	"	67,925	28,862
	Outlying ..	408,678	146,149	..	344,720	139,104
Mungaroa ..	..	243,317	141,930	..	225,272	127,949
Epuni ..	..	203,064	133,801	..	180,154	116,106
Wainuiomata ..	..	209,408	132,089	..	190,448	120,830
Makara	Makara ..	105,038	56,388	C.V.	104,543	56,331
	Seatoun ..	340,878	285,403	"	315,848	266,638
Total of county	..	1,956,982	1,099,678	C.V.	1,794,969	1,021,038
Collingwood—						
Aorere ..	..	119,770	60,800	..	93,672	37,057
Pakawau ..	..	86,454	63,355	..	68,880	51,111
Total of county	..	206,224	124,155	C.V.	162,552	88,168
Takaka—						
Waitapu ..	..	138,436	64,715	..	128,522	57,654
Anatoki ..	..	139,186	81,799	..	101,792	46,663
Total of county	..	277,622	146,514	C.V.	230,314	104,317
Waimea—						
Moutere	Upper Moutere	56,013	25,504	C.V.	54,583	25,115
	Outlying ..	57,944	34,313	..	56,791	33,704
Motueka	Riwaka ..	148,077	92,367	C.V.	141,031	86,403
	Outlying ..	142,025	72,490	..	133,276	65,001
Stoke ..	Stoke ..	314,788	221,474	C.V.	293,178	207,988
Wai-iti	Dovedale ..	53,800	25,525	"	51,752	24,399
	Waimea W.	92,010	60,445	"	89,777	59,682
	Outlying ..	313,937	178,539	..	296,549	167,454
Wangapeka ..	..	122,982	75,102	..	99,248	52,204
Motupiko ..	..	136,110	86,341	..	107,198	58,863
Wangamoa	Suburban N.	132,580	71,514	C.V.	123,229	66,763
	Outlying ..	9,807	8,180	..	6,179	4,909
	Maitai, Outlying	18,146	15,743	..	12,384	9,981
Total of county	..	1,598,219	967,537	C.V.	1,465,175	862,466

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

County and Riding.	Road District or Town District.	Gross Values.		System of Rating.	Rateable Values.	
		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
Sounds—		£	£		£	£
Pelorus Sound portion (Croixelles to Cape Lambert)	..	262,777	150,244	..	216,721	105,186
Queen Charlotte Sound and Port Underwood portion	..	102,122	67,625	..	78,501	44,292
Total of county	..	364,899	217,869	Nil	295,222	149,478
Marlborough—						
Pelorus ..	Pelorus ..	366,726	231,808	U.V.	285,903	153,653
Havelock ..	Havelock T.D.	26,830	8,837	C.V.	21,957	7,462
Picton ..	Picton ..	222,942	136,849	"	201,288	118,272
Spring Creek ..	Spring Creek	207,000	159,405	"	203,908	157,443
Omaka ..	Omaka ..	356,026	264,145	"	348,751	262,102
Wairau ..	Wairau ..	477,798	358,848	"	445,922	329,584
Awatere ..	Awatere ..	779,242	640,399	"	733,590	596,406
Total of county	..	2,436,566	1,800,291	Nil.	2,241,319	1,624,922
Kaikoura—						
Clarence ..	..	104,560	79,320	..	81,273	56,033
Suburban ..	..	136,646	103,273	..	130,855	100,282
Peninsula ..	..	56,397	24,725	..	49,804	22,578
Conway ..	..	191,999	151,056	..	179,566	138,623
Hundalee ..	..	63,886	50,263	..	43,632	30,009
Total of county	..	553,488	408,637	C.V.	485,130	347,525
Buller—						
Karamea ..	..	56,660	19,078	..	56,140	18,841
Wareatea North ..	..	339,647	185,961	..	238,628	97,960
Wareatea South ..	..	90,592	64,225	..	30,518	13,709
Lyell	..	26,913	16,813	..	11,797	3,017
Charleston ..	..	61,028	51,242	..	9,787	2,714
Total of county	..	574,840	337,319	C.V.	346,870	136,241
Inangahua—						
Hampden ..	..	406,493	358,339	..	84,472	37,445
Boatman's ..	..	104,672	73,566	..	43,324	13,438
Reefton ..	..	182,094	56,990	..	157,207	48,076
Murray ..	..	16,208	10,471	..	8,794	3,627
Crushington ..	..	56,013	48,538	..	10,620	3,145
Antonio's ..	..	91,147	68,267	..	36,268	14,138
Total of county		856,627	616,171	U.V.	340,685	119,869

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

County and Riding.	Road District or Town District.	Gross Values.		System of Rating.	Rateable Values.	
		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
Grey—		£	£		£	£
Cobden ..	..	98,925	65,813	..	50,599	24,131
Brunnerton ..	..	148,469	105,019	..	63,438	28,680
Waipuna ..	..	147,514	114,102	..	53,648	22,372
Nelson Creek ..	..	72,432	54,299	..	27,963	10,694
Red Jack's ..	..	111,277	99,877	..	33,120	21,720
Maori Creek ..	..	56,451	49,790	..	45,316	39,954
Paroa.. ..	..	40,487	22,593	..	27,393	11,280
Marsden ..	..	21,418	17,961	..	6,290	3,291
Hohonu ..	..	111,765	97,883	..	38,787	25,371
Total of county	..	808,738	627,337	C.V.	346,554	187,493
Westland—						
Arahura ..	..	81,658	51,893	..	46,422	19,748
Kanieri ..	..	193,394	107,086	..	107,884	35,149
Southern ..	..	534,623	510,240	..	56,949	32,953
Total of county	..	809,675	669,219	C.V.	211,255	87,850
Cheviot—						
Hawkeswood ..	..	166,875	139,494	..	166,596	139,215
Kaiwara ..	..	88,450	83,100	..	88,450	83,100
Waiau ..	..	114,375	90,620	..	112,826	90,286
Lowry ..	..	127,068	92,146	..	122,660	90,263
Hurunui ..	..	98,229	79,825	..	97,077	79,358
Seaward ..	..	112,391	76,027	..	108,262	75,029
Total of county	..	707,388	561,212	U.V.	695,871	557,251
Amuri—						
Hanmer ..	..	209,357	145,087	..	187,194	128,692
Pahau ..	..	227,943	164,713	..	226,129	163,283
Waiau ..	..	381,777	324,664	..	379,594	323,919
Rotherham ..	..	118,678	88,852	..	118,120	88,738
Total of county	..	937,755	723,316	C.V.	911,037	704,632
Ashley—						
Waipara ..	Waipara ..	1,354,751	1,144,554	C.V.	1,347,345	1,140,230
Mount Thomas ..	Ashley ..	327,183	248,911	"	313,898	237,283
Kowai	Kowai ..	649,065	475,206	"	640,579	472,189
	Amberley T.D.	31,293	10,426	"	28,163	9,781
Oxford ..	Oxford ..	415,771	299,686	"	369,921	258,620
Cust ..	Cust ..	175,627	130,413	"	172,992	129,794
Mandeville ..	Mandeville-Rangiora	744,098	583,244	"	735,438	580,147
West Eyreton ..	West Eyreton	195,327	161,524	"	194,445	161,155
Eyreton ..	Eyreton ..	448,340	344,897	"	443,878	343,686
Total of county	..	4,341,455	3,398,861	Nil	4,246,659	3,332,885

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

County and Riding.	Road District or Town District.	Gross Values.		System of Rating.	Rateable Values.	
		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
		£	£		£	£
Selwyn—						
Avon ..	Avon ..	629,463	386,906	A.V.	618,417	382,605
Riccarton	Riccarton ..	1,161,534	707,590	C.V.	890,405	502,081
	Templeton ..	535,596	315,404	"	522,701	310,132
Courtenay ..	Courtenay ..	868,165	632,105	"	844,504	626,489
Malvern	Malvern ..	189,952	145,002	"	179,345	141,759
	East Malvern	187,274	147,959	"	183,039	145,809
	S'th Malvern	127,218	96,612	"	125,514	96,318
	Upper Waimakariri	65,524	52,484	"	64,615	52,275
Heathcote ..	Heathcote ..	572,744	309,820	"	559,415	308,006
Halswell	Taitapu ..	126,228	97,067	"	124,127	96,581
	Spreydon ..	201,056	98,448	U.V.	196,711	97,268
	Halswell ..	396,432	277,457	C.V.	372,057	268,054
Coleridge	L'keColeridge	287,578	231,086	"	286,764	230,272
	Rakaia ..	353,118	260,033	"	349,472	258,391
Lincoln	Springs ..	633,012	470,212	"	595,247	467,891
	Lincoln ..	432,001	343,456	"	424,531	342,207
Ellesmere	Ellesmere ..	1,532,237	1,210,001	"	1,512,267	1,205,744
	Southbridge T.D.	36,652	12,991	"	31,819	12,089
Total of county	..	8,335,784	5,794,633	C.V.	7,880,950	5,543,971
Mount Herbert—						
Port Victoria ..	..	81,199	52,024	..	76,985	51,250
Port Levy ..	..	130,381	98,372	..	129,626	98,360
Total of county	..	211,580	150,396	C.V.	206,611	149,610
Akaroa—						
Port Levy ..	Pigeon Bay	156,288	108,930	C.V.	155,215	108,863
Little River ..	Little River	463,346	360,376	"	454,449	353,774
Okain's Bay ..	Okain's Bay	137,923	98,859	"	136,815	98,621
Le Bon's Bay ..	Le Bon's Bay	103,790	75,818	"	103,569	75,734
Wainui ..	Town of Akaroa & Wainui	454,140	314,122	"	446,172	312,496
Total of county	..	1,315,487	958,105	C.V.	1,296,220	949,488
Ashburton—						
Mount Hutt ..	Mount Hutt	937,845	757,662	C.V.	924,476	749,859
South Rakaia ..	South Rakaia	778,883	605,595	"	767,280	601,819
Mount Somers	M'nt Somers	295,643	239,485	"	286,102	232,197
	Anama ..	375,562	312,055	"	374,852	311,550
Upper Ashburton ..	Upper Ashburton	758,059	577,070	"	753,968	575,947
Wakanui	Wakanui ..	477,558	353,661	"	472,281	353,147
	Hampstead T.D.	97,182	42,242	"	86,742	41,797

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

County and Riding	Road District or Town District.	Gross Values.		System of Rating.	Rateable Values	
		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
Ashburton—*contd.*		£	£		£	£
Rangitata ..	Rangitata ..	388,196	310,287	C.V.	384,188	309,113
Ashburton	Longbeach	582,905	464,527	"	579,556	464,126
	Coldstream	292,299	226,025	"	289,383	225,235
	Tinwald T.D.	57,138	31,124	"	55,252	30,706
Total of county	..	5,041,270	3,919,733	C.V.	4,974,080	3,895,496
Geraldine—						
Mount Peel ..	Mount Peel	483,757	392,451	C.V.	480,956	391,166
Raukapuka	Geraldine ..	614,878	478,307	"	610,111	477,218
	Geraldine T.D.	59,618	14,689	"	53,257	13,043
Temuka ..	Temuka ..	990,180	809,276	"	978,811	803,861
Total of county	..	2,148,433	1,694,723	C.V.	2,123,135	1,685,288
Levels—						
Tengawai ..	..	304,450	251,187	..	303,296	250,892
Point ..	..	227,375	187,763	..	224,024	186,917
Waimataiti ..	..	231,870	180,765	..	231,480	180,377
Seadown ..	..	213,880	176,649	..	212,497	176,327
Claremont ..	..	169,711	136,682	..	168,221	136,602
Gleniti ..	..	169,914	89,488	..	166,674	88,033
Otipua ..	..	244,964	174,852	..	242,919	174,344
Total of county	..	1,562,164	1,197,386	C.V.	1,549,111	1,193,492
Mackenzie—	..					
Te Kapo ..	..	238,339	216,458	..	331,613	210,712
Fairlie ..	..	246,179	167,100	..	240,996	166,140
Albury ..	..	334,818	287,240	..	331,954	286,532
Total of county	..	819,336	670,798	C.V.	804,563	663,384
Waimate—						
Upper Pareora ..	..	297,825	259,266	..	297,007	258,448
Lower Pareora ..	..	252,170	211,072	..	249,643	210,690
Hakataramea ..	..	236,196	193,878	..	234,064	192,819
Otaio	..	375,126	318,393	..	373,820	318,228
Makikihi ..	..	294,094	235,793	..	292,065	235,522
Deep Creek ..	..	458,709	367,421	..	455,022	366,214
North Waihao ..	..	1,001,483	832,756	..	992,829	827,354
Total of county	..	2,915,603	2,418,579	U.V.	2,894,450	2,409,275
Waitaki—						
Ahuriri ..	..	121,750	110,116	..	121,750	110,116
Otakaika ..	..	327,773	237,858	..	321,584	237,553
Awamoko ..	..	452,391	385,291	..	451,147	385,083
Papakaio ..	..	528,733	400,319	..	521,196	398,837
Waiareka ..	..	551,485	435,986	..	547,108	435,693

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

County and Riding.	Road District or Town District.	Gross Values.		System of Rating.	Rateable Values.	
		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
Waitaki—*continued.*		£	£		£	£
Incholme ..	..	227,829	197,907	..	227,452	197,832
Kakanui ..	..	313,206	257,869	..	311,764	257,604
Otepopo ..	..	228,320	156,232	..	222,623	155,609
Moeraki ..	..	152,697	116,043	..	148,022	115,866
Total of county	..	2,904,184	2,297,621	C.V.	2,872,646	2,294,193
Maniototo—						
St. Bathan's ..	..	75,566	41,347	..	74,576	41,257
Idaburn ..	..	62,190	42,850	..	62,190	42,850
Mount Ida ..	..	176,865	106,403	..	171,341	106,265
Kyeburn ..	..	64,517	43,222	..	64,513	43,218
Puketoi ..	..	96,648	65,718	..	95,749	65,684
Hyde	..	38,412	23,582	..	36,711	23,476
Serpentine ..	..	53,863	47,442	..	53,863	47,442
Total of county	..	568,061	370,564	C.V.	558,943	370,192
Waihemo—						
Green Valley ..	..	45,469	31,173	..	45,069	31,163
Dunback ..	..	59,716	38,199	..	58,487	38,074
Macrae's ..	..	96,277	63,707	..	94,884	63,625
Blue Mountain ..	..	85,170	57,131	..	84,770	57,011
Meadowbank ..	..	31,643	25,692	..	31,643	25,692
Bushy ..	..	77,600	51,378	..	77,600	51,378
Goodwood ..	..	66,927	45,767	..	66,386	45,737
Total of county	..	462,802	313,047	C.V.	458,839	312,680
Waikouaiti—						
Hawksbury ..	..	194,750	139,351	..	193,815	139,236
Merton ..	..	254,320	116,704	..	160,568	109,164
Blueskin ..	..	164,036	80,077	..	157,776	79,499
North-east Valley	..	78,198	43,080	..	77,748	43,020
Total of county	..	691,304	379,212	C.V.	589,907	370,919
Peninsula—						
	Otago Heads	64,513	33,788	C.V.	54,758	33,138
Portobello Bay	Portobello (Portobello Ward)	65,293	38,712	"	181,612	107,769
Broad Bay ..	Portobello (Broad Bay Ward)	58,232	34,455	"		
North-east Harbour	Portobello (North-east Harbour Ward)	62,417	35,463	"		

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

County and Riding.	Road District or Town District.	Gross Values.		System of Rating.	Rateable Values.	
		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
Peninsula—*continued.*		£	£		£	£
Sandymount ..	Peninsula (Sandymount Ward)	56,670	36,046	C.V.		
Highcliff ..	Peninsula (Highcliff Ward)	68,771	40,399	"	244,891	142,420
Anderson's Bay ..	Peninsula (Anderson's Bay Ward)	126,080	66,775	"		
Tomahawk ..	Tomahawk ..	33,503	22,720	"	33,268	22,610
Total of county	..	534,479	308,358	Nil	514,529	305,937
Taieri—						
Strath Taieri ..	..	224,025	162,067	..	221,420	161,727
Deep Stream ..	..	163,624	129,927	..	162,734	129,832
Maungatua ..	..	188,999	144,131	..	186,459	143,835
Outram	Outram T.D.	44,645	22,016	C.V.	40,328	21,197
	Outlying ..	212,432	180,632	..	211,891	180,526
East Taieri ..	..	169,967	124,465	..	167,737	124,143
North Taieri	Half-way Bush	20,861	9,749	C.V.	20,475	9,729
	Outlying ..	145,510	92,983	..	144,318	92,903
Kaikorai ..	..	202,746	106,106	..	202,664	106,193
Otokia	Allanton T.D.	9,976	3,540	C.V.	8,556	3,230
	Outlying ..	155,936	107,355	..	153,047	107,046
Total of county	..	1,538,721	1,082,971	C.V.	1,519,629	1,080,361
Tuapeka—						
Teviot ..	..	139,976	93,025	..	138,522	92,872
James ..	..	247,795	175,916	..	245,092	175,754
Beaumont ..	..	46,538	34,362	..	45,805	34,289
Gabriel's ..	..	40,256	21,243	..	39,264	21,169
Waipori ..	..	43,558	33,173	..	42,790	33,105
Tapanui ..	..	192,557	132,814	..	190,607	132,570
Brown's ..	..	92,647	55,894	..	91,694	55,827
Clark's ..	..	55,610	33,452	..	54,348	33,350
Waitahuna ..	..	60,875	32,622	..	59,021	32,427
Total of county	..	919,812	612,502	C.V.	907,143	611,363
Bruce—						
Clarendon ..	..	58,999	40,663	..	58,769	40,605
Mount Stuart ..	Mount Stuart	102,111	72,461	C.V.	101,159	72,391
Waihola ..	..	75,109	40,398	..	72,597	40,033
Balmoral ..	Balmoral ..	253,737	175,818	C.V.	253,257	175,638
Tokomairiro ..	..	217,711	146,000	..	213,174	145,547

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

County and Riding	Road District or Town District.	Gross Values.		System of Rating.	Rateable Values	
		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
Bruce—*continued.*		£	£		£	£
Glenledi ..	..	36,444	26,828	..	36,236	26,823
Crichton ..	..	101,218	71,487	..	100,427	71,351
Kaitangata ..	..	62,927	43,553	..	62,055	43,193
Matau	Inch-Clutha	83,250	64,785	C.V.	82,180	64,630
	Outlying ..	86,095	58,420	..	85,445	58,270
Total of county	..	1,077,601	740,413	C.V.	1,065,299	738,481
Clutha—						
Glenkenich ..	..	156,037	104,680	..	154,581	104,619
Waipahi ..	..	140,193	92,832	..	138,217	92,681
Clydevale ..	..	115,016	87,274	..	114,356	87,204
Pomahaka ..	..	198,650	151,574	..	196,520	151,442
Clinton	Clinton T.D.	19,918	6,484	A.V.	17,753	6,144
	Outlying ..	66,607	51,220	..	66,432	51,200
Clutha ..	..	139,951	100,899	..	139,825	100,896
Richardson ..	..	155,019	99,884	..	151,155	99,623
South Molyneux ..	..	129,822	78,661	..	123,177	78,350
Catlin's ..	..	187,943	99,546	..	183,655	99,035
Total of county	..	1,309,156	873,054	C.V.	1,285,671	871,194
Islands (Quarantine and Goat)	..	3,450	900	Nil	..	..
Vincent—						
Hawea ..	..	87,380	64,848	..	78,420	61,086
Clutha ..	..	42,780	22,506	..	29,497	13,490
Lindis ..	..	22,388	15,599	..	21,016	15,219
Matakanui ..	..	60,213	38,484	..	55,538	37,021
Manuherikia ..	..	76,470	50,352	..	69,934	48,411
Dunstan ..	..	103,122	61,340	..	88,427	56,782
Carrick ..	..	39,273	26,292	..	39,522	26,196
Earnscleugh ..	..	41,517	23,704	..	33,344	19,203
Total of county	..	473,143	303,125	C.V.	415,698	277,408
Lake—						
Matukituki ..	..	23,696	19,300	..	7,021	3,433
Shotover ..	..	20,624	17,064	..	5,745	2,794
Greenstone ..	..	48,413	38,630	..	21,530	12,446
Cardrona ..	..	43,242	27,181	..	23,807	11,403
Queenstown ..	..	57,772	57,220	..	45,904	29,010
Arrow ..	..	92,482	62,451	..	86,525	54,455
Kingston ..	..	59,195	48,833	..	41,338	32,562
Total of county	..	345,424	250,679	C.V.	231,870	146,103
Fiord ..	..	144,425	137,645	Nil	15,819	9,039

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

County and Riding.	Road District or Town District.	Gross Values.		System of Rating.	Rateable Values.	
		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
Wallace—		£	£		£	£
Mararoa ..	..	342,767	269,750	..	273,508	202,101
Waiau ..	..	294,268	223,963	..	232,367	163,759
Wairio ..	..	400,861	258,818	..	373,807	236,706
Otautau	Otautau T.D.	32,086	9,146	C.V.	29,672	8,694
	Outlying ..	375,504	264,605	..	365,381	256,550
Orepuki ..	..	189,709	102,896	..	169,932	86,909
Aparima ..	..	310,304	205,755	..	302,606	199,802
Total of county	..	1,945,499	1,334,933	C.V.	1,747,273	1,154,521
Southland—						
Oreti	..	433,193	315,492	..	408,526	296,304
Wakaia ..	..	309,888	229,737	..	279,425	203,591
Winton ..	..	1,058,469	681,550	..	1,023,322	655,112
Hokonui	Outlying — Waimumu portion	227,583	182,793	..	215,261	170,971
	Outlying— north'n portion and Mabel subdivision	404,167	279,317	..	390,523	269,232
	Outlying* ..	356,898	261,772	..	349,791	257,793
Mataura	Tuturau ..	189,279	133,374	U.V.	187,659	132,596
	Outlying ..	166,214	114,267	..	158,589	109,338
Wallacetown ..	..	335,915	228,306	..	329,693	225,208
Awarua	Invercargill	168,389	85,963	Nil	158,169	78,782
	Outlying ..	338,643	199,086	..	333,011	197,097
Waihopai ..	..	495,177	359,596	..	455,950	324,947
Toetoes	Outlying— Wyndham portion	90,856	63,739	..	88,724	61,956
	Wyndham T.D.	35,503	11,663	U.V.	32,107	11,078
	Outlying ..	471,531	333,652	..	406,876	274,052
Total of county	..	5,081,705	3,480,307	U.V.	4,817,626	3,268,057
Stewart Island—						
North ..	..	64,163	43,445	..	21,942	13,919
South ..	..	97,144	91,562	..	8,651	3,980
Total of county	..	161,307	135,007	C.V.	30,593	17,899
Islands— Antipodes Auckland Campbell	..	13,880	13,880	Nil.	680	680
Cook			Not Valued.			

* Formerly Knapdale Road District.

Boroughs.

TABLE showing (1) CAPITAL VALUE OF LAND with IMPROVEMENTS (and distinguishing the UNIMPROVED VALUE of LAND). (2.) CAPITAL VALUE of RATEABLE PROPERTY, with IMPROVEMENTS (and distinguishing the UNIMPROVED VALUE of LAND) in each BOROUGH in NEW ZEALAND as at 31st March, 1904.

Boroughs.	Gross Values.		System of Rating.	Rateable Values.	
	Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
	£	£		£	£
Whangarei	161,503	61,491	C.V.	155,383	58,761
Birkenhead	109,926	50,124	A.V.	107,353	48,471
Devonport	598,364	243,176	U.V.	560,478	215,415
Auckland	7,287,925	3,734,874	A.V.	6,804,637	3,507,611
Parnell	464,841	193,547	"	436,876	181,792
Newmarket	220,940	94,802	"	216,323	92,035
Grey Lynn	578,943	274,698	U.V.	567,935	270,632
Onehunga	293,069	140,404	A.V.	275,667	131,736
Hamilton	289,141	183,443	U.V.	253,042	157,422
Cambridge	88,587	27,821	A.V.	77,545	23,461
Thames	295,783	115,314	"	274,502	110,268
Tauranga	89,230	30,240	"	79,044	28,148
Te Aroha	55,757	24,189	"	49,854	21,176
Waihi	187,450	64,667	C.V.	171,049	59,579
Gisborne	527,297	312,173	A.V.	482,435	289,213
Napier	1,294,497	585,570	"	1,137,329	522,884
Hastings	565,474	318,561	"	551,304	315,209
Dannevirke	367,241	227,147	"	352,714	218,501
Woodville	98,008	43,756	U.V.	86,789	39,876
New Plymouth ..	987,127	616,423	A.V.	889,029	556,000
Hawera	330,299	177,046	"	301,053	160,629
Patea	64,109	21,919	"	55,982	19,954
Stratford	312,621	158,552	U.V.	285,061	143,956
Eltham	171,416	98,235	C.V.	164,516	93,830
Inglewood	138,686	67,055	"	123,899	58,648
Wanganui	1,332,946	854,556	A.V.	1,181,781	755,758
Marton	116,631	40,512	"	103,766	38,240
Feilding	333,566	167,520	U.V.	314,669	159,331
Palmerston North ..	1,419,893	868,797	"	1,347,853	824,008
Foxton	121,579	61,509	A.V.	113,819	59,578
Onslow	288,347	147,847	U.V.	282,385	144,987
Karori	344,771	211,413	"	333,391	202,168
Wellington—					
City Ward.. ..	11,802,759	6,913,234	"	9,936,541	5,895,765
Melrose Ward ..	1,081,313	752,988	"	1,054,418	735,980
Pahiatua	149,102	71,737	"	139,440	68,738
Masterton	740,479	406,573	"	668,212	374,811
Carterton	170,652	82,172	C.V.	158,635	77,973
Greytown	149,943	58,974	A.V.	141,984	56,906
Lower Hutt	826,762	619,457	U.V.	800,205	600,728
Petone	499,854	255,916	A.V.	485,467	250,393
Richmond	99,022	53,813	C.V.	96,547	52,688

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

Boroughs.	Gross Values.		System of Rating.	Rateable Values.	
	Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
	£	£		£	£
Nelson	865,161	348,906	A.V.	759,255	323,029
Picton	118,518	52,351	C.V.	102,442	44,839
Blenheim	401,668	170,761	A.V.	371,515	162,659
Motueka	139,661	84,922	C.V.	135,319	83,536
Westport	199,919	82,586	A.V.	163,512	61,229
Greymouth	543,615	183,240	U.V.	485,904	163,569
Brunner	70,330	11,539	A.V.	66,223	9,381
Kumara	34,575	6,072	C.V.	24,712	4,037
Hokitika	168,693	66,008	U.V.	127,158	48,343
Ross	21,006	5,413	C.V.	16,821	4,456
Rangiora	189,719	74,980	C.V.	175,794	71,900
Kaiapoi	164,416	48,517	A.V.	151,641	46,142
Christchurch—					
Central Ward ..	4,627,411	2,282,830	U.V.	4,274,132	2,166,576
St. Albans Ward ..	951,962	365,211	"	937,127	361,738
Sydenham Ward ..	1,117,303	385,446	"	1,030,815	331,993
Linwood Ward ..	704,584	237,991	"	694,075	235,617
Woolston	259,503	109,377	"	246,321	106,177
New Brighton ..	100,566	46,245	A.V.	97,667	45,281
Sumner	165,680	85,509	U.V.	152,615	81,919
Lyttelton	853,204	238,897	A.V.	314,549	142,392
Akaroa	55,418	17,778	C.V.	50,825	16,758
Ashburton	264,588	97,561	A.V.	239,880	86,328
Temuka	123,443	37,388	C.V.	102,415	33,088
Timaru	874,804	324,610	A.V.	784,314	301,006
Waimate	142,282	51,658	U.V.	121,049	46,610
Oamaru	531,719	179,223	A.V.	491,657	172,701
Hampden	21,539	7,460	C.V.	19,339	7,280
Naseby	34,249	4,174	A.V.	22,134	3,949
Palmerston	58,756	14,354	C.V.	53,986	13,882
Hawksbury	61,414	28,530	"	59,507	28,215
Port Chalmers ..	259,145	80,438	A.V.	234,660	76,203
West Harbour ..	148,996	65,239	"	142,765	63,994
North-east Valley ..	365,354	155,471	"	354,377	153,976
Maori Hill	236,816	110,590	"	235,656	125,371
Roslyn	600,325	249,011	"	585,360	244,596
Mornington	388,266	152,443		380,213	151,103
Dunedin	5,441,582	2,565,904	"	4,990,262	2,338,464
Caversham	617,760	253,009	"	589,005	247,954
South Dunedin ..	469,363	142,141	"	452,978	139,156
St. Kilda	268,787	130,486	"	261,057	129,336
Green Island ..	40,861	11,234	"	34,996	10,569
Mosgiel	166,683	65,200	"	155,525	62,475
Roxburgh	30,545	3,448	"	26,832	3,173
Lawrence	99,874	23,339	"	85,838	21,378
Tapanui	19,069	2,580	"	14,964	2,443
Milton	138,868	38,562	"	132,020	37,887
Balclutha	96,546	32,809	U.V.	91,501	59,812

TABLE showing the CAPITAL VALUE of LAND, &c.—*continued.*

Boroughs.	Gross Values.		System of Rating.	Rateable Values.	
	Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).		Capital Value (Land and Improvements).	Unimproved Value of Land (included in previous column).
	£	£		£	£
Kaitangata	62,520	28,037	A.V.	59,125	27,517
Arrowtown	27,183	4,754	"	20,899	4,217
Queenstown	70,294	12,226	"	61,142	11,271
Cromwell	38,402	9,149	"	33,567	7,762
Alexandra	45,803	10,257	"	41,836	9,684
Gore	285,907	105,958	U.V.	258,610	98,634
Mataura	128,001	50,111	A.V.	121,388	46,515
Winton	49,829	19,613	U.V.	46,132	18,337
Gladstone	39,790	16,140	A.V.	38,303	15,890
Avenal	26,690	8,093	"	26,690	8,093
North Invercargill ..	50,492	20,312	"	49,135	19,882
East Invercargill ..	58,259	17,695	"	58,109	17,645
Invercargill	1,255,449	500,375	U.V.	1,117,516	435,593
South Invercargill ..	118,253	45,038	"	116,230	44,523
Riverton	60,826	15,206	A.V.	52,574	13,788
Campbelltown	201,992	89,132	"	185,517	79,867

SUPPLEMENTAL TO PART II.

Statistical View of Fifty Years' Progress in New Zealand, 1854–1903.

I.—Population.

Year.	Population (exclusive of Maoris and for Annexed Pacific Islands) on 31st December.			Births.	Deaths.	Marriages.
	Males.	Females.	Totals.			
1854	17,914	14,640	32,554	..	..	..
1855	20,781	16,411	37,192	1,460	470	406
1856	25,356	20,184	45,540	1,722	406	404
1857	27,606	22,196	49,802	1,966	434	478
1858	33,679	25,734	59,413	2,272	582	534
1859	41,107	30,486	71,593	2,647	704	603
1860	45,394	34,317	79,711	3,146	1,092	690
1861	61,062	37,959	99,021	3,441	1,109	878
1862	79,680	46,132	125,812	4,064	1,231	1,091
1863	105,978	58,070	164,048	5,115	1,983	1,485
1864	106,580	65,578	172,158	6,501	2,921	1,878
1865	117,376	73,231	190,607	7,490	2,757	1,908
1866	125,080	79,034	204,114	8,466	2,540	2,038
1867	131,929	86,739	218,668	8,918	2,702	2,050
1868	134,621	91,997	226,618	9,391	2,662	2,085
1869	140,112	97,137	237,249	9,718	2,721	1,931
1870	145,732	102,668	248,400	10,277	2,703	1,851
1871	156,431	110,555	266,986	10,592	2,642	1,864
1872	162,404	117,156	279,560	10,795	3,192	1,873
1873	170,406	125,540	295,946	11,222	3,645	2,276
1874	194,349	147,511	341,860	12,844	4,161	2,828
1875	213,294	162,562	375,856	14,438	5,712	3,209
1876	225,580	173,495	399,075	16,168	4,904	3,196
1877	227,681	180,937	408,618	16,856	4,685	3,114
1878	240,627	191,892	432,519	17,770	4,645	3,377
1879	257,894	205,835	463,729	18,070	5,583	3,352
1880	268,364	216,500	484,864	19,341	5,437	3,181
1881	274,986	225,924	500,910	18,732	5,491	3,277
1882	283,303	234,404	517,707	19,009	5,701	3,600
1883	294,665	246,212	540,877	19,202	6,061	3,612
1884	305,667	257,637	564,304	19,846	5,740	3,800
1885	312,125	263,101	575,226	19,693	6,081	3,813
1886	317,646	271,740	589,386	19,299	6,135	3,488
1887	324,558	278,803	603,361	19,135	6,137	3,563
1888	324,948	282,432	607,380	18,902	5,708	3,617
1889	328,588	287,464	616,052	18,457	5,772	3,632
1890	332,557	292,951	625,508	18,278	5,994	3,797
1891	336,174	297,884	634,058	18,273	6,518	3,805
1892	345,146	305,287	650,433	17,876	6,459	4,002
1893	357,635	314,630	672,265	18,187	6,767	4,115
1894	363,763	322,365	686,128	18,528	6,918	4,178
1895	369,725	328,981	698,706	18,546	6,863	4,110
1896	376,987	337,175	714,162	18,612	6,432	4,843
1897	384,703	344,353	729,056	18,737	6,595	4,928
189	392,124	351,339	743,463	18,955	7,244	5,091
1899	398,679	357,826	756,505	18,835	7,680	5,461
1900	403,628	364,650	768,278	19,546	7,200	5,860
1901	414,223	373,434	787,657	20,491	7,634	6,095
1902	425,908	382,021	807,929	20,655	8,375	6,394
1903	439,674	392,831	832,505	21,829	8,528	6,748

Note.—Maori population excluded from above was 43,143 in 1901, and that of Cook and other Islands, 12,292 persons.

II.—Land and Stock.

Year.	Occupied and Cultivated Holdings over One Acre in Extent.	Land (including Sown Grasses) under Cultivation.	Live-stock.†			
			Horses.	Horned Cattle.	Sheep.	Pigs.
	Number.	Acres.				
1854	..	..	..	..	..	..
1855	..	..	..	..	..	..
1856	..	..	..	..	..	..
1857	..	121,648	..	..	..	..
1858	..	141,007	14,912	137,204	1,523,324	40,734
1859	..	156,940	..	..	..	..
1860	..	..	..	..	..	..
1861	..	226,621	28,275	193,285	2,761,383	43,270
1862	..	..	..	..	..	..
1863	..	..	..	..	..	..
1864	..	382,655	49,409	249,760	4,937,273	61,276
1865	..	..	..	..	..	..
1866	..	..	..	..	..	..
1867	..	676,909	65,715	312,835	8,418,579	115,104
1868	11,932	783,435	..	..	..	..
1869	13,476	997,477	..	..	..	..
1870	10,211	1,140,279	..	..	..	..
1871	14,874	1,226,222	81,028	436,592	9,700,629	151,460
1872	15,304	1,416,933	..	..	..	..
1873	15,883	1,651,712	..	..	..	..
1874	16,092	1,943,653	99,261	494,113	11,674,863	123,741
1875	17,250	2,377,402	..	..	..	..
1876	18,750	2,940,711	..	..	..	..
1877	20,519	3,523,277	..	..	..	..
1878	21,048	3,982,866	137,768	578,430	13,069,338	207,337
1879	23,129	4,506,889	..	..	..	..
1880	24,147	4,768,192	..	..	..	..
1881	26,298	5,189,104	161,736	698,637	12,985,085	200,083
1882	27,352	5,651,255	..	..	..	..
1883	28,587	6,072,949	..	..	..	..
1884	29,814	6,550,399	..	..	..	..
1885	31,763	6,668,920	..	..	..	..
1886	33,332	6,845,177	187,382	853,358	16,564,595	277,901
1887	34,743	7,284,752	..	..	..	..
1888	35,747	7,670,167	..	..	..	..
1889	38,178	8,015,426	..	..	..	..
1890	38,083	8,462,495	..	..	..	..
1891	41,224	8,893,225	211,040	831,831	18,128,186	308,812
1892	42,768	9,713,745	..	..	18,570,752	..
1893	45,290	10,063,051	..	885,305	19,380,369	..
1894	46,676	10,128,076	..	964,034	20,230,829	..
1895	52,790	10,698,809	237,418	1,047,901	19,826,604	239,778
1896	58,904*	11,550,075	249,813	1,138,067	19,138,493	209,834
1897	60,759*	11,444,563	252,834	1,209,165	19,687,954	186,027
1898	62,639*	11,984,606	258,115	1,203,024	19,673,725	193,512
1899	62,485*	12,474,511	261,931	1,222,139	19,348,506	249,751
1900	62,786*	12,636,035	266,245	1,256,680	19,355,195	250,975
1901	63,982*	13,083,971	279,672	1,361,784	20,233,099	224,024
1902	65,034*	13,357,700	286,955	1,460,663	20,342,727	193,740
1903	66,092*	13,504,004	298,714	1,593,547	18,954,553	226,591

* Holdings of exactly 1 acre, besides certain Maori holdings, are included. † Prior to 1892 this information is given for the years in which a census of the colony was taken.

III.—Trade.

Exports (the Produce of New Zealand).

Year.	Wool.		Grain.		Frozen Meat.	
	Quantity.	Value.	Quantity.	Value.	Quantity.	Value.
	Lb.	£	Bushels.	£	Cwt.	£
1854	1,254,416	70,103	93,700	41,019	..	..
1855	1,772,344	93,104	150,352	82,302	..	..
1856	2,559,618	146,070	66,150	24,032	..	..
1857	2,648,716	176,579	81,757	29,676	..	..
1858	3,810,372	254,022	71,403	20,680	..	..
1859	5,096,751	339,779	118,740	39,016	..	..
1860	6,665,880	444,392	55,683	13,112	..	..
1861	7,855,920	523,728	8,118	2,518	..	..
1862	9,839,265	674,226	6,602	1,821	..	..
1863	12,585,980	830,495	3,238	1,160	..	..
1864	16,691,666	1,070,997	3,580	722	..	..
1865	19,180,500	1,141,761	25,447	6,076	..	..
1866	22,810,776	1,354,152	32,610	7,297	..	..
1867	27,152,966	1,580,608	158,811	26,986	..	..
1868	28,875,163	1,516,548	632,556	114,125	..	..
1869	27,765,636	1,371,230	520,556	96,441	..	..
1870	37,039,763	1,703,944	854,399	141,135	..	..
1871	37,793,734	1,606,144	1,032,902	164,087	..	..
1872	41,886,997	2,537,919	1,058,480	178,886	..	..
1873	41,535,185	2,702,471	598,431	136,832	..	..
1874	46,848,735	2,834,695	1,162,782	291,103	..	..
1875	54,401,540	3,398,155	1,276,927	231,417	..	..
1876	59,853,454	3,395,816	2,172,098	337,878	..	..
1877	64,481,324	3,658,938	1,323,910	276,452	..	..
1878	59,270,256	3,292,807	2,112,214	508,767	..	..
1879	62,220,810	3,126,439	3,470,344	660,557	..	..
1880	66,860,150	3,169,300	5,540,445	898,997	..	..
1881	59,415,940	2,909,760	5,815,960	986,072	..	..
1882	65,322,707	3,118,554	4,310,984	907,961	15,244	19,339
1883	68,149,430	3,014,211	6,723,303	1,286,724	87,975	118,328
1884	81,139,028	3,267,527	5,489,635	766,824	254,069	345,090
1885	86,507,431	3,205,275	4,597,645	513,697	296,473	373,857
1886	90,853,744	3,072,971	3,523,324	463,549	346,055	427,193
1887	88,824,382	3,321,074	4,126,836	443,780	402,107	455,870
1888	83,225,733	3,115,008	5,101,167	668,859	552,298	628,800
1889	102,227,354	3,976,375	6,120,202	985,224	656,822	783,374
1890	102,817,077	4,150,599	8,287,024	1,030,415	898,894	1,087,617
1891	106,187,114	4,129,686	5,877,059	676,338	1,000,307	1,194,724
1892	118,180,912	4,313,307	6,625,525	816,272	869,600	1,033,377
1893	109,719,684	3,774,738	4,855,368	583,397	903,836	1,085,167
1894	144,295,154	4,827,016	2,434,295	226,183	1,025,243	1,194,545
1895	116,015,170	3,662,131	2,381,837	215,783	1,134,097	1,262,711
1896	129,151,624	4,391,848	2,941,821	346,197	1,103,362	1,251,993
1897	135,835,117	4,443,144	1,919,887	235,429	1,407,921	1,566,286
1898	149,385,815	4,645,804	1,045,980	136,120	1,551,773	1,698,750
1899	147,169,497	4,324,627	6,985,999	721,817	1,865,827	2,088,856
1900	140,706,486	4,749,196	9,529,847	1,034,014	1,844,831	2,123,881
1901	146,820,079	3,699,103	13,373,515	1,285,811	1,857,547	2,253,262
1902	160,419,023	3,354,563	5,865,562	786,548	2,138,557	2,718,763
1903	155,128,381	4,041,274	5,362,748	533,865	2,378,650	3,197,043

III.—Trade—*continued.*

Exports (the Produce of New Zealand)—*continued.*

Year.	Butter.		Cheese.		Phormium Fibre.	
	Quantity.	Value.	Quantity.	Value.	Quantity.	Value.
	Cwt.	£	Cwt.	£	Tons.	£
1854	807	7,399	169	975	48	1,563
1855	785	5,786	406	2,163	150	4,674
1856	647	3,837	290	1,414	22	552
1857	382	2,102	549	1,818	38	710
1858	532	2,838	934	3,995	64	1,516
1859	859	5,588	1,067	4,296	77	1,593
1860	1,026	6,623	810	3,535	61	1,240
1861	25	126	404	1,844	2	43
1862	Butter and cheese not separately given for years 1862 to 1865. The total export for this period was 617 cwt., value £2,976				13	261
1863					13	251
1864					7	170
1865					3	75
1866	232	1,590	13	65	45	996
1867	38	192	90	362	126	4,256
1868	138	532	335	1,240	534	8,137
1869	2,705	14,679	2,331	8,040	2,028	45,245
1870	3,435	12,995	2,735	9,327	5,471	132,578
1871	4,342	12,426	1,619	4,023	4,248	90,611
1872	1,629	4,462	1,362	4,379	3,985	99,405
1873	722	2,342	1,993	6,625	6,454	143,799
1874	357	1,168	1,326	4,408	2,038	37,690
1875	104	660	442	1,862	639	11,742
1876	871	3,910	885	3,488	897	18,285
1877	5,206	23,458	4,999	16,713	1,053	18,826
1878	3,106	12,111	3,019	9,368	622	10,666
1879	339	1,631	172	628	445	7,874
1880	2,717	8,350	717	1,983	894	15,617
1881	2,426	8,496	3,056	6,112	1,308	26,285
1882	11,264	52,088	3,553	10,130	2,040	41,955
1883	8,869	42,020	2,519	6,892	2,013	36,761
1884	15,766	66,593	10,342	25,074	1,525	23,475
1885	24,923	102,387	15,245	35,742	1,063	16,316
1886	23,175	105,537	16,429	45,657	1,112	15,922
1887	17,018	54,921	23,913	54,562	1,578	25,094
1888	29,995	118,252	36,682	78,918	4,042	75,269
1889	37,955	146,840	26,558	67,105	17,084	361,182
1890	34,816	122,701	40,451	84,986	21,158	381,789
1891	39,430	150,258	39,770	86,675	15,809	281,514
1892	53,930	227,162	41,493	91,042	12,793	214,542
1893	58,149	254,645	46,201	99,626	12,587	219,375
1894	60,771	251,280	55,655	115,203	4,677	66,256
1895	57,964	227,601	76,743	150,909	1,806	21,040
1896	71,353	281,716	71,372	130,166	2,968	32,985
1897	99,002	402,605	77,683	150,517	2,769	30,674
1898	96,801	403,690	68,711	135,776	4,850	74,556
1899	136,086	571,799	69,440	141,818	10,371	184,411
1900	172,583	740,620	102,849	229,111	15,906	332,182
1901	201,591	882,406	104,294	238,685	10,171	195,728
1902	253,998	1,205,802	74,746	163,539	20,852	534,031
1903	285,106	1,318,067	74,780	194,998	22,652	595,684

III.—TRADE—*continued.*

Exports (the Produce of New Zealand)—*continued.*

Year.	Gold.		Gum (Kauri).		Provisions, Tallow, Timber, &c.
	Quantity.	Value.	Quantity.	Value.	Value.
	Oz.	£	Tons.	£	£
1854	..	..	1,660	28,864	170,967
1855	..	..	355	4,514	173,324
1856	..	..	1,440	18,591	123,937
1857	10,436	40,442	2,521	35,250	82,817
1858	13,533	52,443	1,810	20,036	78,419
1859	7,336	28,427	2,010	20,776	81,833
1860	4,538	17,585	1,046	9,851	52,795
1861	194,234	752,657	856	9,888	48,437
1862	410,862	1,591,389	1,103	11,107	77,835
1863	628,450	2,431,723	1,400	27,027	52,105
1864	480,171	1,857,847	2,228	60,590	59,089
1865	574,574	2,226,474	1,867	46,060	82,729
1866	735,376	2,844,517	2,535	70,572	116,901
1867	686,753	2,700,275	2,685	77,491	89,294
1868	637,474	2,504,326	2,690	72,493	51,361
1869	614,281	2,362,995	2,850	111,307	80,197
1870	544,880	2,157,585	4,391	175,074	212,044
1871	730,029	2,787,520	5,054	167,958	338,335
1872	445,370	1,730,992	4,811	154,167	396,976
1873	505,337	1,987,425	2,833	85,816	412,660
1874	376,388	1,505,331	2,568	79,986	397,762
1875	355,322	1,407,770	3,230	138,523	285,715
1876	318,367	1,268,559	2,888	109,234	351,731
1877	366,955	1,476,312	3,632	118,348	469,670
1878	311,437	1,244,190	3,445	132,975	573,735
1879	284,100	1,134,641	3,228	147,535	484,150
1880	303,215	1,220,263	4,725	242,817	544,973
1881	250,683	996,867	5,460	253,778	574,880
1882	230,893	921,664	5,533	260,369	921,290
1883	222,899	892,445	6,518	336,606	1,121,257
1884	246,392	988,953	6,393	342,151	1,116,799
1885	222,732	890,056	5,876	299,762	1,154,819
1886	235,578	939,648	4,920	257,653	1,058,552
1887	187,938	747,878	6,790	362,434	1,085,468
1888	229,608	914,309	8,482	380,933	1,274,780
1889	197,492	785,490	7,519	329,590	1,606,828
1890	187,641	751,360	7,438	378,563	1,440,731
1891	251,161	1,007,172	8,388	437,056	1,436,671
1892	237,393	951,963	8,705	517,678	1,200,525
1893	227,502	915,921	8,317	510,775	1,113,799
1894	221,614	887,865	8,338	404,567	1,112,233
1895	293,493	1,162,181	7,425	418,766	1,269,031
1896	263,694	1,041,428	7,126	431,323	1,269,680
1897	251,647	980,204	6,641	398,010	1,389,398
1898	280,175	1,080,691	9,905	586,767	1,562,834
1899	389,570	1,513,180	11,116	607,919	1,645,313
1900	373,614	1,439,602	10,159	622,293	1,784,350
1901	455,558	1,753,784	7,541	446,114	1,935,567
1902	507,852	1,951,426	7,430	450,223	2,333,704
1903	533,314	2,037,832	9,357	631,102	2,288,327

III.—TRADE—*continued.*

Year.	Exports (the Produce of New Zealand).	Imports.		Coal-mines, Output from.
	Total Value.	Total Value.	From United States (included in previous Column).	
	£	£	£	Tons.
1854	320,890	891,201	..	..
1855	365,867	813,460	..	..
1856	318,433	710,868	..	..
1857	369,394	992,994	5,978	..
1858	433,949	1,141,273	5,276	..
1859	521,308	1,551,030	5,945	
1860	549,133	1,548,333	18,474	
1861	1,339,241	2,493,811	26,790	
1862	2,358,020	4,626,082	89,806	
1863	3,342,891	7,024,674	109,998	
1864	3,050,634	7,000,655	109,222	
1865	3,503,421	5,594,977	45,084	
1866	4,396,090	5,894,863	129,300	
1867	4,479,464	5,344,607	92,590	
1868	4,268,762	4,985,748	117,326	
1869	4,090,134	4,976,126	69,109	
1870	4,544,682	4,639,015	60,497	
1871	5,171,104	4,078,193	59,345	
1872	5,107,186	5,142,951	90,657	..
1873	5,477,970	6,464,687	143,273	..
1874	5,152,143	8,121,812	191,539	..
1875	5,475,844	8,029,172	213,492	..
1876	5,488,901	6,905,171	192,287	..
1877	6,058,717	6,973,418	269,656	..
1878	5,784,619	8,755,663	432,572	162,218
1879	5,563,455	8,374,585	438,399	231,218
1880	6,102,300	6,162,011	238,011	299,923
1881	5,762,250	7,457,045	343,645	337,262
1882	6,253,350	8,609,270	463,493	378,272
1883	6,855,244	7,974,038	419,250	421,764
1884	6,942,486	7,663,888	348,557	480,831
1885	6,591,911	7,479,921	401,532	511,063
1886	6,386,682	6,759,013	337,322	534,353
1887	6,551,081	6,245,515	298,736	558,620
1888	7,255,128	5,941,900	323,069	613,895
1889	9,042,008	6,308,863	342,436	586,445
1890	9,428,761	6,260,525	355,395	637,397
1891	9,400,094	6,503,849	361,795	668,794
1892	9,365,868	6,943,056	381,627	673,315
1893	8,557,443	6,911,515	379,378	691,548
1894	9,085,148	6,788,020	394,691	719,546
1895	8,390,153	6,400,129	394,233	726,654
1896	9,177,336	7,137,320	492,840	792,851
1897	9,596,267	8,055,223	628,044	840,713
1898	10,324,988	8,230,600	800,411	907,033
1899	11,799,740	8,739,633	775,309	975,234
1900	13,055,249	10,646,096	1,061,873	1,093,990
1901	12,690,460	11,817,915	1,415,260	1,227,638
1902	13,498,599	11,326,723	1,318,937	1,362,702
1903	14,838,192	12,788,675	1,441,358	1,420,193

Prior to 1878, 709,931

IV.—Transport.

Year.	Shipping.			Government Railways. (Figures to 31st March following.)		
	Inwards.	Outwards.	Registered Vessels belonging to the Colony.	Miles open for Traffic.	Miles under Construction.	Railway Receipts.
	Tonnage.	Tonnage.	Gross Tonnage.			
						£
1854	74,831	76,718	..	..	..	..
1855	88,614	79,825	..	..	..	..
1856	85,748	82,991	..	..	..	..
1857	78,309	76,524	6,662	..	..	..
1858	90,118	82,293	6,852	..	..	..
1859	136,580	120,392	7,883	..	..	..
1860	140,276	140,293	8,527	..	..	..
1861	197,986	205,350	9,144	..	..	..
1862	301,365	288,647	10,825	..	..	..
1863	419,935	394,665	15,189	..	..	..
1864	426,004	433,253	22,573	..	..	..
1865	295,625	283,020	24,484	..	..	..
1866	330,303	306,979	26,787	..	..	..
1867	309,568	308,169	23,240	..	..	..
1868	277,105	287,710	24,539	..	..	..
1869	250,731	247,764	25,990	..	..	..
1870	273,151	265,407	26,743	..	..	..
1871	274,643	265,618	27,107	..	..	..
1872	300,302	285,366	23,963	..	..	..
1873	289,297	281,847	30,035	145	434	..
1874	399,296	385,533	38,935	209	621	21,198
1875	416,727	417,820	42,025	542	464	72,073
1876	393,180	393,334	44,401	718	427	469,051
1877	388,568	400,609	42,479	1,052	251	569,898
1878	456,490	428,493	46,965	1,089	142	758,096
1879	473,940	475,752	64,457	1,171	284	762,572
1880	395,675	424,041	66,316	1,288	192	836,077
1881	420,134	413,487	72,387	1,333	187	892,026
1882	461,285	438,551	76,196	1,371	171	953,347
1883	494,926	507,565	84,903	1,404	224	961,304
1884	529,188	534,242	92,696	1,479	158	1,045,712
1885	519,700	513,000	95,887	1,613	179	1,047,418
1886	502,572	488,331	94,196	1,721	171	998,768
1887	489,754	493,583	94,027	1,753	169	994,843
1888	526,435	531,478	86,132	1,777	163	997,615
1889	602,634	593,252	87,411	1,809	176	1,095,569
1890	662,769	649,705	98,907	1,842	132	1,121,701
1891	618,515	625,807	102,068	1,869	170	1,115,432
1892	675,223	656,100	101,156	1,886	188	1,181,522
1893	615,604	642,466	100,388	1,948	148	1,172,792
1894	631,100	631,250	99,588	1,993	127	1,150,851
1895	672,951	648,946	100,988	2,014	114	1,183,041
1896	614,097	627,659	105,553	2,018	124	1,286,158
1897	686,899	675,333	119,713	2,055	92	1,376,008
1898	765,255	765,793	126,113	2,090	113	1,469,665
1899	811,183	807,866	129,583	2,104	111	1,623,891
1900	854,632	825,275	137,767	2,212	208	1,727,236
1901	1,063,274	1,075,906	143,183	2,235	212	1,874,586
1902	1,089,179	1,048,770	147,822	2,291	194	1,974,038
1903	1,102,064	1,113,165	150,909	2,328*	175	2,180,641

* There are besides 113 miles of private lines.

IV.—TRANSPORT—*continued.*

Year.	Electric Telegraph.*			Post Office Money Orders issued.	
	Miles of Line.	Number of Messages.	Cash and Cash Values, including Telephones.	Number.	Amount.
			£		£
1854	..	..	..	..	..
1855	..	..	..	..	..
1856	..	..	..	..	..
1857	..	..	..	..	..
1858	..	..	..	..	..
1859	..	..	..	..	..
1860	..	..	..	..	..
1861	..	..	..	..	..
1862	..	..	..	1,410	6,590
1863	..	..	..	11,586	55,703
1864	..	..	..	16,591	78,556
1865	..	..	..	17,236	78,576
1866	699	48,231	9,114	22,710	108,779
1867	714	87,436	14,295	24,473	115,610
1868	1,471	134,647	26,224	25,854	118,211
1869	1,611	173,746	32,649	28,427	127,218
1870	1,887	238,195	27,422	31,864	140,454
1871	2,015	369,085	37,203	36,291	157,397
1872	2,312	491,205	44,669	44,660	191,009
1873	2,389	637,941	55,195	52,351	219,258
1874	2,632	844,301	62,322	62,712	263,164
1875	3,156	993,323	74,420	73,027	293,481
1876	3,170	1,100,599	80,841	80,255	310,268
1877	3,307	1,182,955	85,589	90,672	334,973
1878	3,434	1,260,324	92,433	101,017	368,255
1879	3,512	1,448,943	112,351	117,999	428,673
1880	3,758	1,304,712	100,023	135,648	465,405
1881	3,824	1,438,772	101,566	135,556	452,182
1882	3,974	1,570,189	102,378	148,162	499,368
1883	4,074	1,599,400	102,958	172,556	541,133
1884	4,264	1,654,305	101,482	186,052	572,666
1885	4,463	1,774,273	112,778	188,622	581,395
1886	4,546	1,836,266	115,666	155,680	547,755
1887	4,646	1,835,394	116,211	159,579	555,744
1888	4,790	1,765,860	104,116	162,387	555,996
1889	4,874	1,802,987	106,462	172,076	589,545
1890	5,060	1,961,161	110,697	176,427	602,077
1891	5,349	1,968,264	117,634	195,239	651,990
1892	5,479	1,904,143	103,813	199,438	694,847
1893	5,513	2,069,791	112,466	210,957	750,929
1894	5,823	2,046,839	114,510	222,678	776,783
1895	6,245	2,124,211	123,112	243,497	812,604
1896	6,285	2,520,169	129,635	269,566	902,160
1897	6,484	2,696,233	136,221	293,659	970,831
1898	6,736	2,960,738	145,295	318,370	1,029,241
1899	6,910	3,469,631	162,945	344,664	1,118,808
1900	7,249	3,898,128	186,978	369,834	1,214,853
1901	7,469	4,167,981	207,476	405,967	1,286,508
1902	7,749	4,559,304	222,495	367,207	1,277,059
1903	7,779	4,965,197	237,564	396,312	1,416,225

* From 1895 (inclusive) the figures are for 31st March of the year following.

V.—ACCUMULATION.

Year.	Banks. (Average of Four Quarters.)			Savings-Banks* (Post Office and private).	
	Deposits.	Assets.	Liabilities.	Number of Depositors.	Balance to credit on 31st Dec.
	£	£	£		£
1854	..	..	..	..	..
1855	..	..	..	..	..
1856	..	..	..	..	..
1857	343,316	419,860	432,494	..	..
1858	448,078	705,738	616,769	715	7,862
1859	541,213	1,003,584	678,474	802	7,996
1860	644,521	992,082	801,588	1,104	12,450
1861	882,754	1,235,952	1,097,162	1,144	22,921
1862	1,596,446	2,691,117	2,092,497	1,496	29,768
1863	2,092,090	4,028,766	2,962,585	2,371	44,117
1864	2,480,303	5,063,458	3,343,172	4,669	94,248
1865	2,638,414	5,455,289	3,522,146	4,304	87,400
1866	3,097,473	5,891,532	4,010,110	4,513	91,863
1867	2,904,594	5,947,160	3,737,695	6,579	156,855
1868	3,102,727	5,734,745	3,838,220	8,121	243,615
1869	3,174,831	6,231,416	3,863,006	10,103	320,383
1870	3,127,769	6,315,354	3,819,670	12,137	388,804
1871	3,334,672	5,871,888	3,988,400	14,275	454,966
1872	3,919,838	5,429,747	4,628,819	17,289	597,002
1873	4,713,806	7,267,720	5,538,030	21,807	812,144
1874	5,564,434	9,954,216	6,490,504	27,215	943,753
1875	5,967,205	10,987,178	6,987,318	30,310	897,326
1876	6,238,471	11,776,070	7,221,399	32,577	905,146
1877	7,185,106	12,992,104	8,152,230	35,709	964,430
1878	8,960,369	15,393,630	10,031,009	39,926	1,043,204
1879	8,021,073	16,054,295	9,057,463	42,679	990,337
1880	8,538,935	14,220,275	9,550,177	47,462	1,148,992
1881	9,069,377	14,863,645	10,083,188	61,054	1,549,515
1882	8,945,346	17,162,234	10,015,273	68,358	1,832,047
1883	8,659,477	17,794,761	9,706,700	73,546	1,784,631
1884	9,643,214	18,442,139	10,691,599	79,514	1,926,759
1885	10,083,296	18,811,567	11,130,244	85,769	2,142,560
1886	10,579,711	19,041,827	11,603,194	91,296	2,133,861
1887	11,031,614	18,799,847	11,995,495	97,496	2,407,776
1888	11,155,778	18,709,444	12,108,353	103,046	2,691,693
1889	11,528,424	17,652,915	12,486,717	110,566	2,858,644
1890	12,368,610	17,735,259	13,356,598	118,344	3,137,023
1891	12,796,098	16,814,518	13,820,458	126,886	3,406,949
1892	13,587,062	17,558,168	14,623,335	135,827	3,580,544
1893	14,433,777	18,255,534	15,489,633	147,199	3,966,849
1894	13,927,217	17,746,421	14,930,791	154,405	4,066,594
1895	13,544,415	18,159,781	14,491,627	163,513	4,620,696
1896	14,490,827	16,900,199	15,520,431	175,173	5,065,864
1897	14,290,512	17,276,771	15,380,248	187,954	5,520,080
1898	14,143,229	17,013,404	15,299,058	199,464	5,746,887
1899	14,591,223	17,190,433	15,834,858	213,172	6,128,297
1900	15,570,610	17,314,535	16,964,582	228,883	6,665,344
1901	16,034,848	18,422,274	17,490,035	245,024	7,268,103
1902	17,231,767	18,999,180	18,701,063	261,948	7,876,877
1903	19,011,114	19,913,546	20,563,879	280,011	8,432,958

* Post-Office savings-banks were first opened in 1867.

V.—ACCUMULATION—*continued.*

Year.	Insurances in Force in the Government Life Insurance Department at end of Year.		Old-age Pensions, 31st March of following Year.		Friendly Societies from which returns received.		Public Trust Office.	
	No. of Policies.	Sums Assured and Bonuses.	No. of Pensions in force.	Amount represented.	No. of Lodges, &c.	No. of Members.	Number of Estates.	Amount represented.
		£		£				£
1854	..	..	..	..	..	..	..	..
1855	..	..	..	..	..	..	..	..
1856	..	..	..	..	..	..	..	..
1857	..	..	..	..	..	..	..	..
1858	..	..	..	..	..	..	..	..
1859	..	..	..	..	..	..	..	..
1860	..	..	..	..	..	..	..	..
1861	..	..	..	..	..	..	..	..
1862	..	..	..	..	..	..	..	..
1863	..	..	..	..	..	..	..	..
1864	..	..	..	..	..	..	..	..
1865	..	..	..	..	..	..	..	..
1866	..	..	..	..	..	..	..	..
1867	..	..	..	..	..	..	..	..
1868	..	..	..	..	..	..	..	..
1869	..	..	..	..	..	..	..	..
1870	59	30,250	..	..	..	..	..	..
1871	454	200,611	..	..	..	..	..	..
1872	1,689	625,421	..	..	..	..	..	..
1873	2,634	995,986	..	..	..	..	257	17,500
1874	3,953	1,453,496	..	..	..	..	293	28,930
1875	4,989	1,836,859	..	..	..	..	347	42,163
1876	6,153	2,282,129	..	..	89	8,560	412	59,720
1877	7,149	2,716,907	..	..	88	8,828	575	67,675
1878	8,711	3,251,220	..	..	110	9,759	627	73,940
1879	10,223	3,726,330	..	..	138	13,165	713	96,315
1880	11,656	4,171,504	..	..	179	14,484	770	117,980
1881	12,411	4,471,182	..	..	272	18,634	836	150,750
1882	15,892	5,273,164	..	..	273	18,700	911	204,545
1883	19,917	5,992,111	..	..	275	18,848	1,024	317,680
1884	21,003	6,224,571	..	..	281	21,144	1,082	392,315
1885	23,218	6,552,242	..	..	302	22,794	1,190	457,620
1886	24,715	7,053,276	..	..	290	21,679	1,293	576,010
1887	25,439	7,136,944	..	..	347	24,928	1,304	715,860
1888	26,168	7,362,488	..	..	353	24,938	1,483	954,675
1889	27,218	7,600,537	..	..	365	26,013	1,561	1,130,960
1890	28,102	7,807,792	..	..	357	26,379	1,678	1,240,097
1891	29,226	8,390,803	..	..	364	27,372	1,825	1,252,625
1892	30,316	8,580,817	..	..	379	28,754	1,912	1,284,745
1893	31,709	8,821,255	..	..	372	29,763	2,022	1,450,918
1894	32,907	9,232,543	..	..	369	29,963	*	*
1895	33,968	9,345,229	..	..	376	30,905	2,086	1,562,269
1896	34,772	9,415,693	..	..	392	31,825	2,236	1,806,953
1897	36,174	9,857,010	..	..	388	32,670	2,334	1,898,163
1898	37,848	10,124,227	7,443	128,082	410	35,501	2,413	1,950,314
1899	39,366	10,341,702	11,285	193,718	433	38,202	2,491	2,110,316
1900	40,368	10,639,978	12,405	211,965	444	40,257	2,667	2,192,594
1901	41,291	10,627,263	12,776	217,192	445	41,236	2,898	2,326,954
1902	42,406	11,024,734	12,481	211,595	462	43,408	3,049	2,467,614
1903	43,116	11,111,807	11,926	200,915	..	..	3,314	2,706,785

* From here figures are for year ended 31st March.

VI.—Public Indebtedness.

Year.	Public Debt: Debentures and Stock in Circulation. (Prior to 1880 the figures are for Calendar Years.)	Debt of Local Bodies (excluding Government Loans).	Year.
	£	£	
31st December, 1854	..	..	31st December, 1854
" 1855	..	..	" 1855
" 1856	..	..	" 1856
" 1857	..	..	" 1857
" 1858	..	..	" 1858
" 1859	..	..	" 1859
" 1860	..	..	" 1860
" 1861	..	..	" 1861
" 1862	836,000	..	" 1862
" 1863	1,289,750	..	" 1863
" 1864	2,219,450	..	" 1864
" 1865	4,368,681	..	" 1865
" 1866	5,435,728	..	" 1866
" 1867	5,781,193	..	" 1867
" 1868	7,182,743	..	" 1868
" 1869	7,360,616	..	" 1869
" 1870	7,841,891	..	" 1870
" 1871	8,900,991	..	" 1871
" 1872	9,985,386	..	" 1872
" 1873	10,913,936	..	" 1873
" 1874	13,366,936	..	" 1874
" 1875	17,400,031	..	" 1875
" 1876	18,678,111	..	" 1876
" 1877	20,691,111	..	" 1877
" 1878	22,608,311	..	" 1878
" 1879	23,958,311	..	" 1879
31st March, 1881	28,185,711	3,039,807	31st March, 1881
" 1882	28,479,111	3,277,584	" 1882
" 1883	29,445,011	3,540,046	" 1883
" 1884	31,071,582	3,962,330	" 1884
" 1885	32,195,422	4,313,223	" 1885
" 1886	33,880,722	4,943,270	" 1886
" 1887	35,741,653	5,620,747	" 1887
" 1888	36,758,437	5,812,803	" 1888
" 1889	38,375,050	5,892,050	" 1889
" 1890	38,667,950	5,978,059	" 1890
" 1891	38,830,350	6,042,693	" 1891
" 1892	38,713,068	6,081,934	" 1892
" 1893	39,257,840	6,203,869	" 1893
" 1894	39,826,415	6,614,824	" 1894
" 1895	40,386,964	6,685,510	" 1895
" 1896	43,050,780	6,737,578	" 1896
" 1897	44,366,618	6,793,398	" 1897
" 1898	44,963,424	6,834,361	" 1898
" 1899	46,938,006	6,963,254	" 1899
" 1900	47,874,452	7,057,350	" 1900
" 1901	49,591,245	7,563,069	" 1901
" 1902	52,966,447	7,839,695	" 1902
" 1903	55,899,019	8,217,196†	" 1903
" 1904	57,522,215*	..	" 1904

* There was in March, 1904, an estimated accrued sinking fund amounting to £2,457,887, leaving a net indebtedness of £55,064,328. † There was in March, 1903, an accrued sinking fund amounting to £878,520, leaving a net indebtedness of £7,338,676.

VII.—Education.

Year.	Scholars at Primary Schools.	Scholars at Secondary or High Schools.	Scholars at Private Schools.	New Zealand University Graduates (Direct Degrees).
1854	..	..	..	..
1855	..	..	..	..
1856	..	..	..	..
1857	..	..	..	..
1858	..	..	..	..
1859	..	..	..	..
1860	..	..	..	..
1861	..	..	..	..
1862	..	..	..	..
1863	..	..	..	..
1864	..	..	..	..
1865	..	..	..	..
1866	..	..	..	..
1867	..	..	..	..
1868	..	..	..	..
1869	..	..	..	..
1870	..	..	..	..
1871	..	..	..	..
1872	..	..	..	..
1873	..	..	..	..
1874	38,215	..	8,237	..
1875	45,562	..	7,316	..
1876	51,964	654	9,357	..
1877	56,239	716	9,992	..
1878	65,040	868	9,206	..
1879	75,556	1,417	10,234	..
1880	82,401	1,631	11,238	..
1881	83,560	1,819	9,987	..
1882	87,179	1,899	10,002	..
1883	92,476	2,384	11,255	..
1884	97,238	2,642	12,203	..
1885	102,407	2,659	11,989	103
1886	106,328	2,358	12,497	117
1887	110,919	2,242	13,417	145
1888	112,685	2,120	13,893	168
1889	115,456	2,147	13,458	199
1890	117,912	2,117	13,626	230
1891	119,523	2,205	14,142	279
1892	122,620	2,262	14,456	323
1893	124,690	2,251	14,922	366
1894	127,300	2,454	14,627	410
1895	129,856	2,525	14,659	464
1896	131,037	2,614	13,947	501
1897	132,197	2,709	14,447	546
1898	131,621	2,706	14,782	603
1899	131,315	2,723	15,295	641
1900	130,724	2,792	15,555	699
1901	131,351	2,899	15,344	757
1902	132,262	3,072	15,624	814
1903	133,568*	3,722	15,609	869

* In addition to these there were in December, 1903, 3,693 children attending the Native Schools, nearly all maintained by the Government, and 746 at Industrial Schools and Orphanages.

Note.—Statistics of schools and scholars, not being complete for years prior to 1874, no figures are entered.

THE TOTALISATOR.

Year.	No. of Totalisator Licenses issued for Meetings held during Financial Year.	Days.	Percentage paid to Treasury.	Total Amount Invested by the Public.
			£	£
1889–90	187	241	..	..
1890–91	219	278	..	..
1891–92	234	300	7,591	506,078
1892–93	240	307	10,800	720,029
1893–94	247	318	10,375	691,673
1894–95	207	268	10,446	696,456
1895–96	170	256	11,156	743,763
1896–97	158	250	11,911	794,096
1897–98	155	268	13,297	886,567
1898–99	144	250	13,695	912,969
1899-1900	154	278	15,983	1,065,580
1900–1901	153	278	17,541	1,168,732
1901–1902	165	309	19,040	1,275,813
1902–1903	148	276	19,734	1,274,102
1903–1904	151	282	20,486	1,357,263

N.B.—The years used for purposes of the table are financial years, not the racing years. This accounts for the number of licenses issued in some of the periods being over the legal limit for one year.

LICENSES UNDER THE GAMING AND LOTTERIES ACT GRANTED TO RELIGIOUS DENOMINATIONS.

RETURN of LICENSES granted by the Colonial Secretary under "The Gaming and Lotteries Act, 1881," to Persons connected with Religious Denominations.

Year.	Total Number of Licenses granted.	Church of England.	Presbyterian Church.	Roman Catholic Church.	Jewish Church.	Not stated.
1894–95	46	9	10	23	..	4
1895–96	48	8	1	18	..	21
1896–97	62	30	3	29	..	..
1897–98	70	35	2	32	1	..
1898–99	40	14	..	26	..	..
1899–1900	42	13	..	29	..	..
1900–1901	55	21	..	33	..	1
1901–1902	59	14	..	45	..	..
1902–1903	65	20	..	44	1	..
1903–1904	71	17	..	53	..	1

PART III.—ARTICLES ON SPECIAL SUBJECTS.

SECTION I.

THE LAND SYSTEM OF NEW ZEALAND.

[By S. Percy Smith, F.R.G.S.]

The Crown lands of New Zealand are administered under "The Land Act, 1892," together with its amendments and the regulations made thereunder.

The distinguishing features of the present land system are the outcome of ideas which have been gradually coming to maturity for some years past in this colony. These features involve the principle of State ownership of the soil, with a perpetual tenancy in the occupier. This, whatever may be the difference in detail, is the prevailing characteristic of the several systems under which land may now be selected. In New Zealand this tendency to State ownership has taken a more pronounced form than in any of the Australian States. In point of fact, a very large proportion of the Crown lands are now disposed of for 999 years. The rentals are based on the assessed value of the land at the time of disposal, without increase or recurring valuations. Under this system there is a fixity of tenure practically equal to freehold, and which, like freehold, necessarily carries with it the power of sale, sub-lease, mortgage, or disposition by will. At the same time the improvements made in the soil by cultivation, &c., are secured to the tenant should he from any cause be obliged to forfeit or surrender his lease.

The advantages of this system to the selector are manifest. When it is taken into consideration that, with few exceptions, the Crown lands are, in their prairie condition, incapable of profitable use, the advantage to the settler of setting free his capital to develop the capabilities of the soil, rather than having to expend it in the purchase of a freehold, is very apparent. One of the most striking benefits of this system is the advantage it gives to the man who, with little more capital than his strong right arm, is enabled to make a home for himself; which, under the freehold system, he would be unable to accomplish.

The values placed on the Crown lands are, as a rule, low, for the State does not so much seek to raise a revenue directly therefrom as to encourage the occupation of the lands by the people; this occupation secures an indirect increased revenue, besides the other advantages resulting from a numerous rural population.

Again, underlying the whole of the New Zealand land system is a further application of the principle of "the land for the people"—viz., the restriction in area which any man may hold. This subject has been forced upon the attention of the Legislature by defects in former systems, under which one individual with means at his command could appropriate large areas, to the exclusion of his less wealthy fellow-settler. Under existing conditions, where the price at which land is offered is fixed for ever, and where choice of selection is by ballot, every would-be settler has the same chance, and may hold under the Crown an equal area of land. The quantity that a selector may hold is so fixed as to encourage the class of moderate farmers, for up to the statutory limit the amount he may select is left almost entirely to himself. The Act defines the amount of land any one may hold at 640 acres of first-class or 2,000 acres of second-class land. These limits apply to lands which are thrown open for optional selection, but in some cases, where the quality of the land is very good and the selectors many, the limit is by regulation made smaller.

In addition to the many advantages offered by the lease-in-perpetuity system, the Land Act provides others, to meet the wants of different classes. The general rule is that land thrown open for optional selection is offered to the public under three different tenures, the choice of which is left to the would-be settler.

The three tenures are:—

(1.) Cash, in which one-fifth of the purchase-money is paid down at once, and the remainder within thirty days. The final title is not given until certain improvements have been made on the land.

(2.) Lease with a purchasing clause, at a 5-per-cent. rental on the value of the land; the lease being for twenty-five years, with the right to purchase at the original upset price at any time after the first ten years and within twenty-five years, or to convert into a lease in perpetuity (3rd tenure).

(3.) Lease in perpetuity, at a rental of 4 per cent. on the capital value.

"The Land Act, 1892," provides for a special class of settlement called small-farm associations, which found favour with the public to a very considerable extent during the first three years after the Act of 1892 came into force, but is now superseded to a large extent by the improved-farm settlement system. The small-farm association system provides that, where not less than twelve individuals have associated themselves together for mutual help, such an association can, with the approval of the Minister of Lands, select a block of land of not more than 11,000 acres, but there must be a selector to each 200 acres in the block. The extreme limit that one person may hold is fixed at 320 acres. Settlements of this class are held on lease in perpetuity, in a similar way to lands

under the same tenure when thrown open for optional selection. The conditions of residence and improvement are the same. The system offers many advantages to the settler, so long as the blocks of land are judiciously chosen, having regard to quality of land, access, markets, and the probability of employment being obtained in the neighbourhood. In the eagerness to obtain lands on such easy terms these points have, in the past, not received sufficient attention by some of the associations, and in consequence they are not all successful.

Under "The Land Act, 1885," there was a somewhat similar system, but it allowed of the acquisition of the freehold. This is now being taken advantage of to a considerable extent.

The following figures show the amount of settlement by associations under both Acts on the 31st March, 1904. At that date there were 657 selectors, holding 119,959 acres under various tenures and in different parts of the country. Many of the settlements, which were carefully selected, are doing well. Others, where long and expensive roads have to be made to them, are as yet not very productive, and many selections have been abandoned.

The village-settlement system of New Zealand has excited much inquiry. This system provides: 1st, villages of one acre sections; 2nd, small farms of 100 acres. There has not been any great extension of this system in recent years. On the 31st March last there were 1,747 settlers holding 36,753 acres, and the total number of persons residing in these settlements was 1,250 and 497 non-resident, the amount advanced by Government for houses, clearing, &c., being £15,115, of which £4,234 had been returned. The total value of improvements on the lands at the same date was £181,264. The above figures do not include the settlement on reserves and endowments.

The improved-farm settlement system was first begun in order to find work for the people. Considerable areas of forest-clad Crown lands were set aside, and small contracts for the clearing, burning, and sowing these with grass have been let. In most cases the farms are selected or balloted for in their primitive state, and the settler is for a time paid for the improvements he makes, or, in other words, the cost of converting forest lands into grass lands is advanced from time to time by the Government. In other cases a piece of forest land is taken in hand, and men are employed at fixed rates in felling, burning, and grassing. When so much grass is laid down as will give a good start, the land is opened for selection in sections of 50 to 200 acres and balloted for among the applicants. The farms are let on lease in perpetuity at a rental sufficient to cover the cost of clearing, &c., together with a fair rental of the land. Up to the 31st March, 1904, 52 settlements had been allocated, covering an area of 90,323 acres, situate in various parts of the colony. At that date 558 settlers had been allotted sections, who, together with their families, numbered 1,722 persons who were residing on the lands. They had felled and grassed 28,598 acres.

The amount paid to the settlers up to the 31st March, 1904, was £54,127, and the total value of improvements on the land (including the Government advances) was £106,416.

The size of holdings averages about 115 acres.

"The Bush and Swamp Crown Lands Settlement Act, 1903."

This Act, passed last session, came into operation at the end of 1903, and provided more liberal conditions for the selection and settlement of bush and swamp lands. The principal provisions are as follows: Land opened under the Act is divided into three classes —(*a*) heavy-bush lands, (*b*) light-bush or swamp lands, and (*c*) scrub land, according to the nature of the vegetation existing on the lands opened for sale or lease. On heavy-bush lands the selector, after payment of his first half-year's rent is exempt for further rent for a period of four years, whilst no rate can be levied or collected by any local authority on the land for the same period; on light-bush lands or swamp lands three years' exemption from rent and rates is allowed, whilst residence for the first five years may be dispensed with on swamp lands; on scrub lands two years' exemption from rent and rates is given.

The Land for Settlements Acts.

In the earlier years of the settlement of New Zealand there were opportunities for men of capital and judgment to acquire large estates, and while there were plenty of good Crown lands to select from this was of great advantage to the colony when money was needed for administration and roads and bridges. These large estates employed hired labour, and most of them did little towards cultivating their lands, and consequently progress beyond the pastoral stage ceased in the districts in which they were situated. As the best lands in the course of years passed from the Crown, the country became a series of agricultural communities interspersed with large properties occupied by a manager and a few shepherds, and the people pressed that they and their sons should be allowed to occupy these large estates instead of being compelled to go into inaccessible back country without roads or railways. To meet this the late Hon. (later Sir) John McKenzie, then Minister of Lands, introduced into the Legislature in the session of 1892 a Bill intituled "The Land for Settlements Act," which authorised the purchase from private individuals of suitable properties for subdivision into farms. Under the provisions of this Act and the amending Acts, which are now consolidated into the Act of 1900, properties have been acquired, and divided into small farms and leased in perpetuity at a 5-per-cent. rental, on a capital value fixed at a rate sufficient to cover first cost, together with survey, administration, and roads (if required). The usual process of acquisition is as follows: Whenever a property is offered to the Government, if it is so situated as to meet the object of the Act, a report on it is obtained from a Government officer, and,

should his report be favourable, the question of purchase is then considered by a Board of Land Purchase Commissioners, composed of the Inspector, who is the permanent Chairman, three other Government officers, whose training and duties qualify them to advise the Government as to whether the purchase is a suitable one, and as to the price which should be given for the property, and a member nominated by the Government from residents in the district where the land to be dealt with is situated. It is only on the advice of this Board that the Government acts. In nearly all cases the properties acquired have been improved to a certain extent by fencing and buildings, and were situated in the neighbourhood of closely settled districts. The amount which may be expended per annum under the Act is £500,000. The Act also provides for the exchange of high-lying pastoral Crown lands for low-lying agricultural lands suitable for small holdings.

Lands may also be taken compulsorily in cases where the Board cannot agree with the owner as to price, &c., and where the Governor in Council decides to acquire the land for closer settlement. The amount payable to the owner is decided by a Compensation Court, composed of a Judge of the Supreme Court and two Assessors, one appointed by Government, the other by the owner of the property. Five properties have hitherto been acquired compulsorily, and they have been disposed of on satisfactory terms.

The acquisition of lands under the Land for Settlements Acts has proved beneficial in providing homes for a large class of men of moderate capital who shrink from the rough work of breaking in new country or who, having accumulated capital (cash, stock, and implements), prefer open country near civilisation. Sons of farmers begin life near the old home, and help from there is given in many ways. The system also affords to the small-farmer class of the Old Country an opening for building up homes for themselves where their previous experience will be of use, instead of having to learn the methods adapted to a new and wild country.

Preference is given to landless people, and applicants for rural land have to satisfy the Land Board as to their means to stock and cultivate the property applied for and erect suitable buildings thereon. The Board, in fact, has a discretion as to who may become tenants.

Land may also be compulsorily taken for workmen's homes within a borough having a population of at least 15,000 persons, or within a radius of fifteen miles from the border thereof, for the purposes of providing workmen's homes or villages; but the area is restricted to not more than 100 acres every year within any such borough, or within the radius named above from the boundary of the borough.

The owner is left with right to retain an area of not more than 10 acres if in a borough, or 50 acres in any other case.

A workman's allotment is not to exceed 5 acres, and advances up to £50 are made by Government to successful applicants in aid of the cost of fencing and building dwellinghouses.

Regulations giving full directions to applicants under this Act have been issued from time to time, which should be in the hands of every one before applying for lands under this Act.

An account of the operations under the Land for Settlements Acts will be found in Part II. of this work.

Purchase of Native Lands by Government.

From about the year 1823 (which is the date of the first recorded deed) until the 6th February, 1840, the date of the Treaty of Waitangi, lands in New Zealand were acquired by direct purchase from the Maoris by individual members of the white races. During the years 1837 to 1839, or about the time it became probable that the sovereignty of the islands would be assumed by the United Kingdom, the greater number of these purchases were made, and they extended to most parts of the country. These purchases are technically known as "the old land claims," and their total number (including pre-emptive claims), as estimated by Commissioner F. Dillon Bell in 1862, was 1,376, covering an area of about 10,322,453 acres, out of which large area grants were recommended for 292,475 acres. These figures have been slightly added to since, but not to any very large extent. The large area shown above was reduced on survey to about 474,000 acres, situated principally to the north of Auckland. The difference in area between the amount granted to the purchasers and the total area surveyed became what are termed "surplus lands of the Crown." It was held that the Native title had been fully extinguished through such purchases over the whole area surveyed; but, as by Ordnance No. 2 of 9th June, 1841, the claimants could not be granted more than 2,560 acres each, the balance became vested in the Crown on the assumption of the sovereignty, the Native title having been fully extinguished.

In many cases the titles did not issue to those to whom the land was awarded, as they were compensated by scrip issued by the Government, with the understanding that such scrip was to be exercised in the purchase of Crown lands in the neighbourhood of Auckland, to which place it was desirable—so soon as the capital was founded—to draw a population. The lands thus paid for in scrip became Crown lands, and these, together with the surplus lands, have from time to time been disposed of by the Crown and settled on. The amount of scrip, &c., issued up to 1862 was over £109,000.

On the signing of the Treaty of Waitangi on the 6th February, 1840, the pre-emptive right was ceded to the Government, and consequently private purchase ceased. This remained the law until the passing of "The Native Land Act, 1862," when the Crown relinquished its right of pre-emption, whilst at the same time

the purchase of Native lands for the Crown did not abate, but continued side by side with the private purchases up to the passing of "The Native Land Court Act, 1894."

"The Maori Lands Administration Act, 1900," is a measure intended to restrain Natives from pauperising themselves in the future by parting with the freehold of the balance of their lands (about five millions of acres). Its main provisions are—

(1.) Prohibition of further alienation of the freehold of Native lands, either to the Crown or private purchasers, except as to inchoate transactions at the date of the passing of the Act and certain limited areas which were then comprised in separate titles and by not more than two owners.

(2.) Leasing of Native lands through partly elected and partly nominated Councils possessing all the powers and, where authorised, exercising all or any of the functions of the Native Land Court.

(3.) Advances to Natives to road and otherwise improve their surplus lands for their own use and occupation.

From time to time since 1840 various sums were appropriated by Government or by Parliament for the acquisition of a Crown estate. Up to the date of passing of "The Native Land Act, 1862," these operations were conducted by officers of the Government specially appointed, who, from a knowledge of the Maoris, their customs and disposition, were successful in securing large areas of land for settlement. It must be conceded that their operations as a whole were successful, and that the number of disputed cases arising out of their labours was exceedingly small. The Waitara purchase is, however, here excluded, for there were reasons of general policy affecting that sale which did not prevail in other cases. This purchase was the ostensible cause of the Native rebellion of 1860 and following years, but the motives which led to it were far deeper than the mere purchase of a few acres—there was a great principle at stake.

The difference effected in the mode of purchase by "The Native Land Act, 1862," was this: Previously, the title of the Maoris who were to receive payment for the land was decided by the Land Purchase officers; but the Act quoted set up a Court, presided over by able Judges, who determined the titles, which were afterwards registered in a special Court. Purchases have since been effected with the registered owners.

It is difficult to obtain figures showing the actual area acquired by the Crown from the Maoris up to 1870, but in round numbers it was 6,000,000 acres in the North Island; whilst the whole of the Middle Island, with the exception of reserves for the original Native owners, was acquired prior to the passing of "The Native Land Act, 1862." Stewart Island was purchased from the Native owners by deed dated 29th June, 1864.

The Native rebellion of 1860–69 brought Native-land purchases, for the time being, practically to a standstill.

The Immigration and Public Works Acts of 1870 and 1873 appropriated £200,000 and £500,000 respectively for the purchase of lands in the North Island; and these amounts have, up to the 31st of March, 1904, been augmented by further annual appropriations from the public funds and other loan-moneys, covering altogether a total expenditure since 1870 of £2,005,365, with the following results: Area finally acquired in the North Island from Natives, from 1870 to 31st March, 1904, 7,958,793 acres. Area under negotiation in the North Island on 31st March, 1904, 110,635 acres; interests therein finally acquired, 10,998 acres.

Digest of the Land Laws.

Administration.

The Crown lands are administered, under the authority of "The Land Act, 1892," by the Hon. the Minister of Lands at Wellington. For convenience the colony is divided into ten land districts, each being under the local direction of a Commissioner and a Land Board. The Commissioner's office is known as the principal land office, and in some of the larger districts there are one or more local land offices. It is with these land offices the selector has to transact all business, from the first consultation of the maps to the final receipt of the Crown title.

Land Districts and Principal Land Offices.

The names of the land districts and of the towns where each principal office is situated are, beginning with the most northerly and taking them geographically, as under:—

Land District.	Town where Principal Land Office is situated.	Land District.	Town where Principal Land Office is situated.
Auckland	Auckland.	Marlborough	Blenheim.
Taranaki	New Plymouth.	Westland	Hokitika.
Hawke's Bay	Napier.	Canterbury	Christchurch.
Wellington	Wellington.	Otago	Dunedin.
Nelson	Nelson.	Southland	Invercargill.

Classification of Lands, &c.

Crown lands are divided into three classes:—

(1.) Town and village lands, the upset prices of which are, respectively, not less than £20 and £3 per acre; such lands are sold by auction:

(2.) Suburban lands, the upset price of which may not be less than £2 an acre; these lands are also sold by auction:

(3.) Rural lands, which may be disposed of at not less than £1 per acre for first-class, and 5s. an acre for second-class lands; such lands may be sold or leased by auction, or sold or leased on application.

No rural section may be larger than 640 acres in extent if first-class land, or 2,000 acres if second-class land, whether offered by auction or application. No person can select more than 640 acres

of first-class or 2,000 acres of second-class land, including therein any land which he then holds. Small grazing-runs, first-class, may not exceed 5,000 acres, and second class 20,000 acres. Pastoral runs are limited to areas which will carry 20,000 sheep or 4,000 cattle. No person can select more than one run.

Mode of acquiring Crown Lands.

Crown lands may be acquired as follows :—

(1.) By auction, after survey, in which case one-fifth of the price is paid down at the time of sale, the balance within thirty days :

(2.) By application, after the lands have been notified as open for selection, in which case the applicant fills up a form (to be obtained at any of the Land Offices) and makes the declaration and undertaking required by the particular system he wishes to select under.

All applications, whether for surveyed or unsurveyed lands, are deemed to be simultaneous if made on the same day, and, if there be more than one applicant for the same land, the right of selection is determined by ballot.

Lands thrown open for application may be either surveyed or unsurveyed, and those not selected the first day remain open.

The Optional System of Selection.

Lands for selection are notified as open for application on and after a stated day, and, *at the option of the applicant,* may be obtained on any of the three following tenures : (*a*) Freehold ; (*b*) occupation with the right of purchase ; (*c*) lease in perpetuity.

(*a.*) *Freehold.*

If the land is surveyed, one-fifth of the price is to be paid down when the application is granted, and the balance within thirty days ; or, if the land is not completely surveyed, the survey fee is deposited when the application is agreed to, and goes towards the purchase of the land ; the balance must be paid within thirty days of notice that the survey is completed.

A certificate of occupation will issue to the purchaser on final payment, which will be exchanged for a Crown title so soon as the Board is satisfied that the improvements mentioned on the next page have been completed.

(*b.*) *Occupation with Right of Purchase.*

Lands selected on this tenure are held under a license for twenty-five years. At any time subsequent to the first ten years, and before the expiration of the license, after having resided and made the improvements hereinafter described, the licensee can, on payment of the upset price of the land, acquire the freehold. If the land be not purchased, the license may be exchanged for a lease in perpetuity.

The rent is 5 per cent. on the cash price of the land; a half-year's rent has to be paid at the time the application is approved, if surveyed land, which represents the half-year's rent due in advance on the 1st day of January or July following the selection. If the land is unsurveyed, the cost of survey is to be paid, and is credited to the selector as so much rent paid in advance, counted from the 1st day of January or July following thirty days' notice of the completion of survey.

Residence and improvement of the land are compulsory, as hereinafter described.

(*c.*) *Leases in Perpetuity.*

Lands selected on this tenure are leased for 999 years, subject to the conditions of residence and improvements described below. The rental is 4 per cent. on the cash price of the land, and applications are dealt with in the same way as under the previous tenure (*b*), but there is at no time a right to purchase the freehold.

Two or more persons may make a joint application to hold as tenants in common under either of the two last-named tenures.

Residence and Improvements.

Under the two last-mentioned tenures, the conditions as to residence and improvements are:—

RESIDENCE—

(1.) Must commence on bush or swamp lands within four years, and in open or partly open land within one year, from the date of selection:

(2.) Must be continuous for six years on bush or swamp land, and for seven years on open or partly open land, on lands occupied with a right of purchase:

(3.) Must be continuous for a term of ten years on lease-in-perpetuity lands.

The Board has power to dispense with residence in certain cases, such as where the selector is residing on adjacent lands, or is a youth or unmarried woman living with parents, and in a few other cases.

RESIDENCE implies the erection of a habitable house to be approved of by the Board.

IMPROVEMENTS which must be made are as follows:—

(1.) Freehold-tenure lands must be improved within seven years to an amount of £1 an acre for first-class land, and 10s. an acre for second-class land.

(2.) Lands held on lease with right of purchase, or on lease in perpetuity, must be improved to an amount equal to 10 per cent. of the value of the land within one year from the date of the license or lease; within two years must be improved to the amount of another 10 per cent.; within six years must be improved to the value of another 10 per cent., making 30 per cent. in all within the six years. In addition to the above, the land must be

further improved to an amount of £1 an acre for first-class land, and on second-class land to an amount equal to the net price of the land, but not more than 10s. an acre.

Improvements may consist of reclamation from swamps, clearing of bush, planting with trees or hedges, cultivation of gardens, fencing, draining, making roads, wells, water-tanks, water-races, sheep-dips, embankments or protective works, or in any way improving the character or fertility of the soil; or the erection of any building, &c.; and *cultivation* includes the clearing of land for cropping, or clearing and ploughing for laying down with artificial grasses, &c.

Special-settlement Associations.

Under the existing regulations any number of persons, not less than twelve, may select and apply for a block of land of not less than 1,000 acres or more than 11,000 acres in extent, but the number of members must be such that there shall be one for every 200 acres in the block, and no one can hold more than 320 acres, except in swamp lands, where the area may be 500 acres.

The capital value of lands within a special settlement is fixed after survey by special valuation, but may not be less than 10s. an acre; the rental is not less than 4 per cent. on the capital value, and the tenure is a lease in perpetuity.

Residence, occupation, and improvements are generally the same as already described, and applications have to be made in manner prescribed by regulations.

Applicants should apply to a Commissioner for a copy of the regulations, as they are liable to change at any time.

Suitable land for small settlement of this kind is now scarce.

Improved-farm Settlements.

Special regulations are in force for this class of settlement, which should be applied for, but briefly the terms are as follow: Applicants are selected by the Commissioner of Crown Lands, preference being given to married men. The areas of the farms may vary from 10 acres to 200 acres, according to locality; no settler can select more than one farm. Contracts are made with the settler to fell the forest, burn it, and sow with grass-seed up to 100 acres, the cost being paid by the Government, and £10 may be advanced to a single man and £30 to a married man to help to build a house. The rates allowed for felling are those current in the district. The land is then leased for 999 years at a rental of 4 per cent. on the unimproved capital value, *plus* the actual cost of the felling and grassing. As a rule, the settlers can get employment on the road-works in the neighbourhood, but Government does not guarantee this.

Residence for the first ten years is compulsory, and improvements must be made in terms of Part III. of "The Land Act, 1892." (See *ante*.)

Village Settlements.

Village settlements are disposed of under regulations made from time to time by the Governor, but the main features are as follow:—

Such settlements may be divided into:—

(1.) Village allotments not exceeding 1 acre each, which are disposed of either by auction among the applicants or by application, as already described, with option of tenure, the cash price being not less than £3 per allotment:

(2.) Homestead allotments not exceeding 100 acres each, which are leased in perpetuity at a 4-per-cent. rental on a capital value of not less than 10s. per acre.

Residence, improvements, and applications are the same as already described. The leases are exempt from liability to be seized or sold for debt or bankruptcy.

The Colonial Treasurer is empowered in certain cases to advance small sums for the purpose of enabling selectors to profitably occupy their allotments.

Small Grazing-runs.

Small grazing-runs are divided into two classes: First class, not exceeding 5,000 acres; second class, not exceeding 20,000 acres in area. The rental in both cases is not less than 2½ per cent. on the capital value per acre, but such capital value cannot be less than 5s. per acre. Small grazing-runs are leased for terms of twenty-one years, with right of renewal for other twenty-one years, at a rent of 2½ per cent. on the then value of the land. The runs are declared open for selection, and applications and declarations on the forms provided have to be filled in and left at the Land Office, together with the deposit of one half-year's rent, which represents that due on the 1st day of March or September following the selection.

No holder of a pastoral run, and no holder of freehold or leasehold land of any kind whatever, over 1,000 acres in area, exclusive of the small grazing-run applied for, may be a selector under this system; and only one small grazing-run can be held by any one person.

The lease entitles the holder to the grazing rights, and to the cultivation of any part of the run, and to the reservation of 150 acres round his homestead through which no road may be taken; but the runs are subject to the mining laws.

Residence is compulsory, if bush or swamp land, within three years; if open, within one year; and must be continuous to the end of the term, but may in a few cases be relaxed. Improvements necessary are as follow: Within the first year, to the amount of one year's rent; within the second year, to another year's rent; and within six years, to the value of two other years' rent: making in all a sum equal to four years' rental which must be expended

within six years. In addition to these improvements, bush-covered first-class runs must be improved to an amount of 10s. an acre, and second-class bush-clad runs to an amount of 5s. an acre.

These runs may be divided, after three years' compliance with the conditions, amongst the members of the selector's family.

Pastoral Runs.

Pastoral country is let by auction for varying terms not exceeding twenty-one years; and, excepting in extraordinary circumstances, runs must not be of a greater extent than will carry 20,000 sheep or 4,000 head of cattle. Runs are classified from time to time by special Commissioners into: (1) Pastoral lands, which are suitable only for depasturing more than 5,000 sheep; (2) pastoral-agricultural lands, suitable for subdivision into areas of under 5,000 acres, which may be either let as pastoral runs, generally for short terms, or cut up for settlement in some other form. Leases of pastoral lands may not be resumed; leases of pastoral-agricultural lands may be resumed at any time after twelve months' notice, without compensation.

No one can hold more than one run; but, in case of any one holding a run of a carrying-capacity less than 10,000 sheep, he may take up additional country up to that limit.

Runs are offered at auction from time to time, and half a year's rent has to be paid down at the time of sale, being the amount due in advance on the 1st day of March or September following the sale, and the purchaser has to make the declaration required by the Act. All leases begin on the 1st day of March, and they entitle the holder to the grazing rights, but not to the soil, timber, or minerals; and the lease terminates over any part of the run which may be leased for some other purpose, purchased, or reserved. The tenant has to prevent the burning of timber or bush; in open country to prevent the growth of gorse, broom, or sweetbriar; and to destroy the rabbits on his run. With the consent of the Land Board, the interest in a run may be transferred or mortgaged, but power of sale under a mortgage must be exercised within two years.

In case it is determined again to lease any run on expiry of the lease, the new lease must be offered by auction twelve months before the end of the term, and if, on leasing, it shall be purchased by some one other than the previous lessee, valuation for improvements, to be made by an appraiser, shall be paid by the incoming tenant, but to a value not greater than three times the annual rent — excepting in the case of a rabbit-proof fence, which is to be valued separately. If the run is not again leased, the value of rabbit-proof fencing is paid by the Crown, but the tenant has no claim against the Crown beyond the value of the rabbit-proof fence; he may, however, within three months of sale, remove fences, buildings, &c. Runs may also be divided with the approval of the Board.

Survey Charges on Unsurveyed Lands.

The following is the scale of charges for surveys of unsurveyed lands:—

Not exceeding 30 acres, £6.

Exceeding 30 and up to 50 acres, 3s. 6d. per acre, but not less than £6.

Exceeding 50 and up to 100 acres, 3s. per acre, but not less than £8 15s.

Exceeding 100 and up to 200 acres, 2s. 6d. per acre, but not less than £15.

Exceeding 200 and up to 300 acres, 2s. per acre, but not less than £25.

Exceeding 300 and up to 500 acres, 1s. 8d. per acre, but not less than £30.

Exceeding 500 and up to 1,000 acres, 1s. 4d. per acre, but not less than £41 10s.

Exceeding 1,000 and up to 2,000 acres, 1s. per acre, but not less than £66 10s.

For the survey of any area of rural land, being open land, the scale of charges shall be two-thirds the foregoing rates.

The Chief Surveyor may vary the above charges by substituting a rate per mile or per day for such work as may not come under the foregoing scale.

ADVANCES TO SETTLERS.

The Government Advances to Settlers Act was a Government policy measure in the legislation of 1894. It was designed to afford relief to a numerous class of colonists who were struggling under the burden of high rates of interest and heavy legal expenses of mortgages. These were established when prices of agricultural produce were high and profits large; and, so long as business continued to be prosperous, they attracted but little, if any, attention. For several years preceding 1894 commerce and agriculture had suffered from world-wide depression; settlers were becoming embarrassed in their circumstances; and the high rates of interest still charged were felt to be a burden on the industry of the people not easily borne, and a hindrance to the settlement and development of the farming lands of the colony. Under these circumstances the Government brought in the Government Advances to Settlers Act. It was passed towards the close of the session of 1894, and immediately came into operation, with results which have proved beneficial to the farming community. A general decline in the rates of interest at once set in, and it is not too much to claim that the Act has been instrumental in lowering these to a considerable extent on several millions of money invested on mortgage of the farming lands of the colony. This result, while it may have diminished the incomes of a few persons resident within the colony, has benefited thousands of

deserving settlers and led to large areas of land being brought under cultivation that, but for the Advances to Settlers Act, would still be in their natural state.

The Act authorised the raising of three million pounds sterling within two years, in sums of a million and a half per annum, at a rate of interest not higher than 4 per cent. In May, 1895, tenders were invited in London for £1,500,000 of 3-per-cent. inscribed stock of the Government of New Zealand, and applications were received for £5,960,400 at prices ranging from £100 to £90. The million and a half was placed at an average price of £94 8s. 9d.

An amending Act, passed in 1895, extended the time for raising the residue of the three millions to three years from the coming into operation of the amending Act. In 1898 this term was extended for a further period of three years, and in 1901 the time-limit restriction was removed altogether, power being given at the same time to raise an additional loan of £1,000,000.

To carry out the objects of the Act, an office was established called the "Government Advances to Settlers Office"; at the same time a General Board was constituted to co-operate with and assist the Superintendent, the title by which the chief administrative officer is known.

The business of the office is the advancing of money in New Zealand on first mortgage of lands and improvements held under the following classes of tenure, free from all encumbrances, liens, and interests other than leasehold interests, that is to say:—

(1.) Freehold land held in fee-simple under "The Land Transfer Act, 1885," or freehold land held in fee-simple the title to which is registered under "The Deeds Registration Act, 1868."

(2.) Crown land held on perpetual lease under "The Land Act, 1885."

(3.) Crown land held under Parts III. and IV. of "The Land Act, 1892."

(4.) Crown land held on lease as a small grazing-run under "The Land Act, 1885," or under "The Land Act, 1892."

(5.) Crown land held on agricultural lease under "The Mining Act, 1891."

(6.) Crown land held on lease (not being for mining purposes) under "The Westland and Nelson Coalfields Administration Act, 1877."

(7.) Native land held on lease under "The West Coast Settlement Reserves Act, 1881," or under the Act of 1892.

(8.) Land held on lease under "The Westland and Nelson Native Reserves Act, 1887."

(9.) Land held under "The Thermal Springs Districts Act, 1881."

(10.) Educational and other reserves which are subject to the provisions of "The Land Act 1877 Amendment Act,

1882," by virtue of Proclamation made under section 50 thereof, or "The Land Act, 1885," by virtue of Proclamation made under section 237 thereof, or "The Land Act, 1892," by virtue of Proclamation made under section 243 thereof, and are held on perpetual lease or lease in perpetuity, or on deferred-payment or small-grazing-run systems.

(11.) Crown land held by license on the deferred-payment system under Part III. of "The Land Act, 1885."

(12.) Land held under lease from a leasing authority, as defined by "The Public Bodies' Powers Act, 1887," and providing for the payment by the incoming tenant of valuation for improvements made upon the land, whether by the lessee named in such lease or any former lessee, as tenant.

With regard to classes 10 and 12, a lease is not eligible if it provides for absolute forfeiture (without compensation) for breach of conditions, or if on the determination of the lease compensation is to be allowed for certain improvements only.

Mortgages are granted either on the instalment or the fixed-loan system (fully described hereafter); and the margins of security required by the Act are as follow:—

(1.) On all freeholds (other than urban or suburban) three-fifths of the value may be advanced either on the instalment or fixed-loan system: Provided that in the case of first-class agricultural freeholds instalment loans may be advanced up to two-thirds of the value.

(2.) On leaseholds (other than urban or suburban) one-half of the value of the lessee's interest in the improvements may be advanced on the instalment system. No loans are granted under the fixed-loan system on leaseholds.

(3.) On urban and suburban freeholds loans are granted on the instalment system only, and the amounts of loan are limited as follow:—

(*a.*) On urban freehold on which buildings exist three-fifths of the value of the land, *plus* one-half the value of the buildings, may be advanced;

(*b.*) On suburban freehold on which buildings exist one-half the value of the land, *plus* one-half the value of the buildings, may be advanced:

(*c.*) On urban or suburban freehold on which no buildings exist one-half the value of the land may be advanced, but on such security no loan shall be granted except for the erection of buildings on the land; the loan to be advanced by instalments, at the discretion of the Board, as the erection of the buildings proceeds.

"Urban land" means land which is situate in a borough having a population of at least two thousand inhabitants and is not used for farming, dairying, or market-gardening purposes.

"Suburban land" means land which is situate in a borough having a population of less than two thousand inhabitants, or in any town, or in the vicinity of any town or borough, and is not used for farming, dairying, or market-gardening purposes.

Lands situated within towns which are used for farming, dairying, or market-gardening are treated in accordance with paragraphs (1) and (2) above.

The right of determining what land may be considered "urban," or "suburban," or "first-class agricultural" is imposed by the Act on the General Lending Board.

The security which the applicant offers for the loan must consist of one or more holdings of the several classes of tenure above mentioned, and must, of course, be of the necessary value; and if the security is leasehold all the covenants and conditions of the lease, including the payment of rent, must have been regularly complied with. Crown lessees should note that "The Land Act, 1892," provides that leases under that Act must be at least twelve months in existence before they can be mortgaged.

Any person desiring an advance should make a written application on the form provided for the purpose, a copy of which can be obtained from any Postmaster in the colony. The Postmaster will also supply an envelope in which the application may be orwarded free of postage, and will afford to the applicant any explanation which may be required respecting the filling-in of the application.

In the case of an application for an advance on the security of an interest in land held under a lease or license issued from the Lands Department (and belonging to one or more of the classes of tenure numbered 2, 3, 4, 5, 6, 9, 10, 11), a notice of the application must be forwarded to the Commissioner of Crown Lands for the district in which the land is situated. The requisite form, and an envelope for forwarding it free of postage, may be obtained from any Postmaster in the colony.

No loan of less than £25 or more than £3,000 can be granted, and in the case of "urban" or "suburban" lands the maximum loan is fixed at £2,000.

All applications must be accompanied by a valuation fee according to the following scale :—

	£	s.	d.
On an application for a loan not exceeding £100	0	10	6
Exceeding £100 but not exceeding £250 ...	1	1	0
Exceeding £250 but not exceeding £500 ...	1	11	6
Exceeding £500 but not exceeding £3,000 ...	2	2	0

If the applicant has already obtained any advance under this Act and is desirous of obtaining a further advance, either on the same security or on a separate security, the amount of the application, added to the amount of the advances already obtained, must not exceed the limit mentioned above—£3,000 for farming and £2,000 for urban or suburban lands.

Mortgages granted on the fixed-loan system may be for any period not exceeding ten years, and the principal is repayable at the end of the term. They may also be repaid in whole or in part on any half-yearly due date during the term, as explained hereafter. Interest at the rate of 5 per cent. is payable half-yearly, reducible to 4½ per cent. provided payment is made not later than fourteen days after due date and no arrears remain outstanding.

Mortgages granted on the instalment system are repayable by seventy-three half-yearly payments of principal and interest combined. They may also be repaid in whole or in part at any time. Interest is charged at the rate of 5 per cent., reducible to 4½ per cent. provided payment is made not later than fourteen days after due date and no arrears remain outstanding.

Every half-yearly instalment, except the last, is at the rate of £3 (less the rebate of interest in case of prompt payment) for every £100 of the loan. The following table shows, taking a loan of £100 as an instance, how much of each instalment is applied to repaying the principal, and how much is in payment of interest. It shows also the amount of rebate in respect of each instalment, and the balance of principal remaining due after payment of the respective instalments until the loan is entirely repaid in thirty-six years and a half:—

TABLE OF PRESCRIBED HALF-YEARLY INSTALMENTS FOR EVERY ONE HUNDRED POUNDS OF THE LOAN.

Half-year.	Prescribed Half-yearly Instalment.	Apportioned thus:		½ per Cent. Rebate of Interest.	Balance of Principal owing.
		On Account of Interest at 5 per Cent.	On Account of Principal.		
	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.
1st	3 0 0	2 10 0	0 10 0	0 5 0	99 10 0
2nd	3 0 0	2 9 9	0 10 3	0 5 0	98 19 9
3rd	3 0 0	2 9 6	0 10 6	0 4 11	98 9 3
4th	3 0 0	2 9 3	0 10 9	0 4 11	97 18 6
5th	3 0 0	2 9 0	0 11 0	0 4 11	97 7 6
6th	3 0 0	2 8 8	0 11 4	0 4 10	96 16 2
7th	3 0 0	2 8 5	0 11 7	0 4 10	96 4 7
8th	3 0 0	2 8 1	0 11 11	0 4 10	95 12 8
9th	3 0 0	2 7 10	0 12 2	0 4 9	95 0 6
10th	3 0 0	2 7 6	0 12 6	0 4 9	94 8 0
11th	3 0 0	2 7 2	0 12 10	0 4 9	93 15 2
12th	3 0 0	2 6 11	0 13 1	0 4 8	93 2 1
13th	3 0 0	2 6 7	0 13 5	0 4 8	92 8 8
14th	3 0 0	2 6 3	0 13 9	0 4 7	91 14 11
15th	3 0 0	2 5 10	0 14 2	0 4 7	91 0 9
16th	3 0 0	2 5 6	0 14 6	0 4 7	90 6 3
17th	3 0 0	2 5 2	0 14 10	0 4 6	89 11 5
18th	3 0 0	2 4 9	0 15 3	0 4 6	88 16 2
19th	3 0 0	2 4 5	0 15 7	0 4 5	88 0 7
20th	3 0 0	2 4 0	0 16 0	0 4 5	87 4 7
21st	3 0 0	2 3 7	0 16 5	0 4 4	86 8 2
22nd	3 0 0	2 3 2	0 16 10	0 4 4	85 11 4
23rd	3 0 0	2 2 9	0 17 3	0 4 3	84 14 1

TABLE OF PRESCRIBED HALF-YEARLY INSTALMENTS FOR EVERY ONE HUNDRED POUNDS OF THE LOAN—*continued.*

Half-year.	Prescribed Half-yearly Instalment.	Apportioned thus:		½ per Cent. Rebate of Interest.	Balance of Principal owing.
		On Account of Interest at 5 per Cent.	On Account of Principal.		
	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.
24th	3 0 0	2 2 4	0 17 8	0 4 3	83 16 5
25th	3 0 0	2 1 11	0 18 1	0 4 2	82 18 4
26th	3 0 0	2 1 6	0 18 6	0 4 2	81 19 10
27th	3 0 0	2 1 0	0 19 0	0 4 1	81 0 10
28th	3 0 0	2 0 6	0 19 6	0 4 1	80 1 4
29th	3 0 0	2 0 0	1 0 0	0 4 0	79 1 4
30th	3 0 0	1 19 6	1 0 6	0 3 11	78 0 10
31st	3 0 0	1 19 0	1 1 0	0 3 11	76 19 10
32nd	3 0 0	1 18 6	1 1 6	0 3 10	75 18 4
33rd	3 0 0	1 18 0	1 2 0	0 3 10	74 16 4
34th	3 0 0	1 17 5	1 2 7	0 3 9	73 13 9
35th	3 0 0	1 16 10	1 3 2	0 3 8	72 10 7
36th	3 0 0	1 16 3	1 3 9	0 3 7	71 6 10
37th	3 0 0	1 15 8	1 4 4	0 3 7	70 2 6
38th	3 0 0	1 15 1	1 4 11	0 3 6	68 17 7
39th	3 0 0	1 14 5	1 5 7	0 3 5	67 12 0
40th	3 0 0	1 13 10	1 6 2	0 3 5	66 5 10
41st	3 0 0	1 13 2	1 6 10	0 3 4	64 19 0
42nd	3 0 0	1 12 6	1 7 6	0 3 3	63 11 6
43rd	3 0 0	1 11 9	1 8 3	0 3 2	62 3 3
44th	3 0 0	1 11 1	1 8 11	0 3 1	60 14 4
45th	3 0 0	1 10 4	1 9 8	0 3 0	59 4 8
46th	3 0 0	1 9 7	1 10 5	0 2 11	57 14 3
47th	3 0 0	1 8 10	1 11 2	0 2 11	56 3 1
48th	3 0 0	1 8 1	1 11 11	0 2 10	54 11 2
49th	3 0 0	1 7 3	1 12 9	0 2 9	52 18 5
50th	3 0 0	1 6 6	1 13 6	0 2 8	51 4 11
51st	3 0 0	1 5 8	1 14 4	0 2 7	49 10 7
52nd	3 0 0	1 4 9	1 15 3	0 2 6	47 15 4
53rd	3 0 0	1 3 11	1 16 1	0 2 5	45 19 3
54th	3 0 0	1 3 0	1 17 0	0 2 4	44 2 3
55th	3 0 0	1 2 1	1 17 11	0 2 2	42 4 4
56th	3 0 0	1 1 1	1 18 11	0 2 1	40 5 5
57th	3 0 0	1 0 2	1 19 10	0 2 0	38 5 7
58th	3 0 0	0 19 2	2 0 10	0 1 11	36 4 9
59th	3 0 0	0 18 1	2 1 11	0 1 10	34 2 10
60th	3 0 0	0 17 1	2 2 11	0 1 8	31 19 11
61st	3 0 0	0 16 0	2 4 0	0 1 7	29 15 11
62nd	3 0 0	0 14 11	2 5 1	0 1 6	27 10 10
63rd	3 0 0	0 13 9	2 6 3	0 1 4	25 4 7
64th	3 0 0	0 12 7	2 7 5	0 1 3	22 17 2
65th	3 0 0	0 11 5	2 8 7	0 1 2	20 8 7
66th	3 0 0	0 10 3	2 9 9	0 1 0	17 18 10
67th	3 0 0	0 9 0	2 11 0	0 0 11	15 7 10
68th	3 0 0	0 7 8	2 12 4	0 0 9	12 15 6
69th	3 0 0	0 6 5	2 13 7	0 0 8	10 1 11
70th	3 0 0	0 5 1	2 14 11	0 0 6	7 7 0
71st	3 0 0	0 3 8	2 16 4	0 0 4	4 10 8
72nd	3 0 0	0 2 4	2 17 8	0 0 3	1 13 0
73rd	1 13 10	0 0 10	1 13 0	0 0 1	..

The mortgagor under the instalment system may pay to the Superintendent at any time, and under the fixed-loan system on any half-yearly due date, the whole balance of principal owing, with interest to date of payment, and obtain a discharge of the mortgage on payment of the fee prescribed for such discharge.

The mortgagor may also from time to time pay to the Superintendent, in addition to the half-yearly payments, sums of £5 or a multiple of £5, and in the case of fixed loans such deposits will be applied in reduction of the advance, and interest will be charged on the balance only; or, if the mortgagor so directs, such deposits will be held on his behalf and applied in payment of the half-yearly instalments of interest as they fall due.

In the case of an instalment loan, money paid in advance by a mortgagor may be applied in one of the following methods, according as he directs:—

(*a*.) It may be held on his behalf and applied in payment of the half-yearly instalments (consisting partly of interest and partly of principal) as they fall due, until the deposit is exhausted.

(*b*.) It may be applied at once in payment of as many future half-yearly instalments of principal (but not of interest) as it will cover, and, as far as such instalments are concerned, the corresponding interest will not be charged. On the next half-yearly date, however, the mortgagor will be required to continue his payments as before, the advance payment having the effect of reducing the period (thirty-six years and a half) during which he would have to pay such instalments. For instance, a mortgagor has a loan of £100: On the due date of his eighth half-yearly instalment he pays, in addition to the amount due, a sum of £5. This is applied in payment of his ninth, tenth, eleventh, twelfth, thirteenth, fourteenth, and fifteenth instalments of principal—12s. 2d., 12s. 6d., 12s. 10d., 13s. 1d., 13s. 5d., 13s. 9d., 14s. 2d. (see table), making a total of £4 11s. 11d.—and the corresponding interest, £2 7s. 10d., £2 7s. 6d., £2 7s. 2d., £2 6s. 11d., £2 6s. 7d., £2 6s. 3d., £2 5s. 10d., is not charged. A balance of 8s. 1d. remains in his favour. Then on the next due date he has to make the half-yearly payment as usual (less 8s. 1d.), but, instead of being the ninth, it counts as the sixteenth instalment, and by this means the whole loan is repaid three years and a half earlier (seven half-yearly payments) than it otherwise would be.

(*c*). It may be applied as provided in the next paragraph.

On the due date of any instalment, after at least one-tenth of the loan has been repaid, by means of the half-yearly instalments or of moneys repaid in advance, or both, the mortgagor (provided he is not in arrear with any instalment or other payment due under the mortgage) may, with the consent of the Superintendent, readjust

the loan by treating the balance of principal then unpaid as a fresh loan duly granted on that date for a fresh term. But no readjustment is allowed unless the balance of unpaid principal amounts to at least £100. Under this arrangement the mortgagor will be relieved of paying interest on the original amount of the loan, and will pay only on the balance of principal not repaid.

Advance payments in reduction of the mortgage, unless made on the due date of a half-yearly payment, take effect only from the next due date.

The law-costs payable for preparing and completing the mortgages under the Act are as under, but the mortgagor will require to pay also a reasonable fee for any additional work that the solicitor may have to undertake :—

Mortgages under "The Land Transfer Act, 1885."

Law-costs of perusing title, preparing and registering mortgage (to be deducted from the advance),—

	£	s.	d.
If advance be not exceeding £250	0	7	6
Exceeding £250, but not exceeding £500	0	10	0
Exceeding £500, but not exceeding £750	0	15	0
Exceeding £750, but not exceeding £1,000	1	1	0
Exceeding £1,000, but not exceeding £1,500	1	6	0
Exceeding £1,500, but not exceeding £2,000	1	11	6
Exceeding £2,000, but not exceeding £3,000	1	17	6
With cash disbursements, which are the same in every case, namely,—			
Mortgage-forms	0	2	0
Search-fee (with an additional 2s. for every certificate of title after the first)	0	2	0
Registration (with an additional 2s. for every certificate of title after the first)	0	10	0

Mortgages under "The Deeds Registration Act, 1868."

Law-costs of perusing title, preparing and registering mortgage (to be deducted from the advance),—

	£	s.	d.
If advance be not exceeding £150	0	18	0
Exceeding £150, but not exceeding £250	1	0	6
Exceeding £250, but not exceeding £500	1	5	0
Exceeding £500, but not exceeding £750	1	13	0
Exceeding £750, but not exceeding £1,000	2	3	0
Exceeding £1,000, but not exceeding £1,500	2	13	0
Exceeding £1,500, but not exceeding £2,000	3	13	0
Exceeding £2,000, but not exceeding £3,000	4	13	0
With cash disbursements,—			
Fee chargeable by solicitor not residing in registration centre for employing agent to register mortgage	0	5	0
Solicitor's charge for obtaining Land Board's consent to mortgage of leasehold land—			
If advance be not exceeding £250	0	2	0
Exceeding £250	0	5	0
Fee for partial or total discharge of mortgage	0	5	0
Fee for execution of consent by the Superintendent to any document	0	5	0
Fee for production of title-deeds held by the Superintendent	0	5	6

Solicitors are entitled to charge moderately for any services mortgagors may require over and above those provided for in the scale—such services, for example, as clearing encumbered titles, obtaining and registering titles, &c.

Valuation reports on the securities offered are made on behalf of the Department by expert land-valuers; and these reports, together with the corresponding valuations appearing in the district valuation-rolls, prepared in accordance with the provisions of "The Government Valuation of Land Act, 1896," and reports from the Commissioners of Crown Lands in thecase of Crown leaseholds, are considered by the General Board. Board meetings are held weekly, or as occasion requires, and the Superintendent is bound by the resolutions of the Board. A resolution is taken with regard to every application placed before the General Board, so that on the Board rests the responsibility of granting loans or of refusing to grant them.

Some applicants offer securities which are obviously not eligible; and in that event the valuation fees paid are returned, the securities are not reported on, and the applications do not go before the Board.

By arrangements made with the Post Office, mortgagors are enabled to pay their instalments and interest to the credit of the Superintendent at any money-order office throughout the colony, and free of all costs for remitting the money to Wellington. This is an arrangement at once convenient and economical for the large number of persons scattered all over the colony who have financial dealings with the Advances to Settlers Office. Loans may also be repaid in full through the Post Office.

The officials of the Government Advances to Settlers Office are bound by declaration to observe secrecy respecting applications for advances, and are forbidden to give any information respecting the business of the Department except to officers appointed to assist in carrying out the provisions of the Act.

The Act provides penalties for persons employed in the business of the Advances to Settlers Office taking any fee or reward from an applicant for a loan under the Act; for persons acting as valuers of land in which they have a pecuniary interest; and for persons who may attempt to bribe any one employed under the Act. It should be understood that no commission, charge, or procuration fee is payable in connection with an application for a loan.

The first meeting of the General Board for the purpose of considering applications for loans was held on 23rd February, 1895; and up to the 31st March, 1904, the Board had authorised 14,413 advances, amounting to £4,854,040. The total amount applied for in the 14,413 applications granted in full and partially was £5,478,020. 1,877 applicants declined the partial grants offered to them, amounting to £844,520; so that the net advances authorised at 31st March, 1904, numbered 12,536, and amounted to £4,009,520. The security for the net authorised advances was valued at £8,704,640. The number of applications received up to 31st March, 1904, was 18,285, for an aggregate amount of £6,630,981.

THE LAND-TAX AND INCOME-TAX.

By "The Land and Income Assessment Act, 1891," a system of taxation was instituted on the unimproved value of land and the capital value of mortgages of land, in conjunction with a tax on incomes in excess of £300 a year. Various amending Acts were passed from time to time, and in 1900 the law was consolidated in "The Land and Income Assessment Act, 1900."

In 1903 an amending Act, containing certain amendments which experience had shown were required, was passed. These two measures, with an annual taxing Act, comprise the legislation on the subject.

The Land-tax.

In 1902–1903 the rate of land-tax in respect of mortgages was reduced from one penny in the pound to three farthings. This represented a reduction of revenue to the extent of £30,000. This loss has now been recouped by revised valuations made, and the yield for 1903–1904 was, in round figures, £335,000, of which the ordinary land-tax was £232,800 and the graduated tax (including the special tax on absentee land-owners) £102,200.

For the purposes of the "ordinary" land-tax, owners are allowed under the Act to deduct from the total unimproved value of their land the amount of any registered mortgage thereon, and the mortgagees are required to make a return of all their mortgages. In the case of uncompleted sales, where the title has not been transferred the amount of unpaid purchase-money is treated as a mortgage—that is, it may be deducted by the purchaser and must be included in the return made by the vendor.

An owner of land the unimproved value of which, together with mortgages owing to him, does not exceed £1,500 (after deducting mortgages owing by him) is allowed an exemption of £500, but where such value exceeds £1,500 the exemption diminishes by £1 for every £2 that such value increases, so that no exemption is allowable when £2,500 is reached.

The Act contains a provision that in cases where the income from any land or mortgages, *plus* income from all other sources, is less than £200 per annum, and the owner is incapacitated by age or infirmity from supplementing such income, a further exemption may be allowed by the Commissioner upon his being satisfied that the payment of the tax would entail hardship on such owner. This discretionary power has been exercised in a considerable number of instances, especially in the case of widows and orphans with small means, and much hardship prevented.

All mortgages are assessed at their full nominal value, except where it is satisfactorily shown that owing to depreciation of the security or other cause such value has been diminished. In the case of mixed mortgages—that is, mortgages which are secured on both real and personal property—the amount of the mortgage

chargeable with land-tax is taken to be the assessed value of the land included in the security, the interest derived from the balance of mortgage being liable to income-tax.

It will be readily seen that the deductions and exemptions which have been referred to materially reduce the number of taxpayers as compared with the number of land-owners, the latter being upwards of 115,000, whilst the former only number about 20,000.

If the unimproved value of land in any assessment amounts to £5,000 or over, graduated tax is payable thereon according to the scale given on another page. Mortgages, however, are not chargeable with the graduated tax; but, on the other hand, no deduction is allowed in an assessment for graduated tax in respect of any mortgage owing on the land.

Fifty per cent. additional on the amount of the graduated tax is levied where the owners have been resident out of the colony for a period of not less than one year next preceding the date of the passing of the annual taxing Act.

Native lands which are occupied by Europeans are subject to the ordinary tax, it being considered that as such lands have benefited equally with the lands of Europeans by the expenditure of public money, they should bear some proportion of the taxation. But, recognising that in some instances, where the interests of the Native owners are small, the collection of the tax might possibly entail some hardship, the Legislature decided that only half the usual rate should be collected on such lands. Graduated tax is not chargeable on Native land.

The Income-tax.

Both the number of income-tax payers and the amount of tax received may appear at first sight smaller than might be expected from the population of New Zealand, but it should be remembered that incomes from land and mortgages are exempt, the unimproved value of the former and the capital value of the latter being chargeable with land-tax in the manner hereinbefore explained. The statutory exemption of £300, *plus* life-insurance premiums up to £50, renders a very large number of employees and small traders exempt from the tax. Companies pay the tax on profits, and dividends are not returnable by their shareholders. These circumstances will account for the smallness of the number (7,400) subject to income-tax and, to a certain extent, the comparatively inconsiderable contribution to the revenue.

Objections to income assessments are heard in private before the Stipendiary Magistrate.

It is impossible to indicate the number and variety of questions which arise daily in connection with income assessments, or to give a full account of how they are dealt with.

Amongst the questions to which special attention has been given is that of the depreciation of plant and machinery, and the amount to be allowed as a deduction under this heading. The

Amendment Act of 1894 admitted, amongst deductions, an allowance for depreciation of plant and machinery over and above what may be claimed as repairs and renewals, and this allowance is maintained in the Act of 1900. The allowance is, by law, fixed at what may be considered just by the Commissioner; but the Chief Inspector of Machinery is, in this matter, the expert adviser of the Department, and he fixes the rates to be allowed. There have been naturally some differences of opinion between owners of machinery and the Department, but only in the case of steam-vessels has the Inspector found it necessary to alter the scale first laid down. The rule formulated for the Inspector's guidance is as follows:—

An allowance to be made of such an amount (over and above what is expended in renewals and repairs) as will equal the annual loss of profit-earning power.

This is not intended to provide for the loss of capital invested, but simply represents the annual loss through wear and tear (as affecting income-earning capacity), other than that which can be made good by renewals of parts and repairs.

Obsolete machinery is also allowed for when the machinery has been actually discarded; and here the amount to be allowed must bear the same proportion to the whole loss as the time the tax has been in operation bears to the life of the machine. An engine discarded in the tenth year of the tax—the life of the engine being, say, twenty years—would be allowed for to one-half of the loss incurred, less the annual amounts that have been allowed by the Department for depreciation during ten years. Machinery superseded by something better, but kept in reserve in case of a breakdown, is not allowed for.

In the consolidating Act of 1900, before referred to, a further allowance is made to taxpayers who occupy their own freehold or leasehold premises. Such taxpayers are now entitled to deduct a sum at the rate of 5 per cent. on the capital value of their interest in the land or improvements thereon. This concession is intended to remove an anomaly which previously existed as between a taxpayer in business who occupied premises for which he paid rent and one who occupied his own freehold, or premises erected on leasehold ground. In the first case rent was deducted, and in the hands of the landlord was not taxable, being income derived from land; in the second case the allowance was limited under the then existing law to 5 per cent. on the amount on which land-tax was paid. This might be nothing, and in the case of premises on leasehold land no allowance could then be made. As an equivalent of the rent paid by a tenant, a freeholder is now allowed a deduction of 5 per cent. on the capital value of his business premises; while a leaseholder, who was previously entitled to deduct his ground-rent only, is now allowed a further deduction of 5 per cent. on the capital value of any leasehold interest he may own in his business premises. Mortgage interest, however, is not now deductible. The deduction of 5 per cent. on the

capital value of the taxpayer's interest in his business premises precludes any further deduction. The effect of the provision is to exclude land, with its profit or loss, from the income-tax system.

It should be mentioned here that the statutory exemption of £300 is not allowed to absentees, whether firms or individuals, nor in any case to companies.

Regulations have been issued for levying income-tax on the profits earned by shipowners whose headquarters are beyond the colony. The plan adopted is to require a return of the outward freight and passenger lists, and to levy tax at the rate of one shilling in the pound upon 5 per cent. of the total returned.

Yield of Tax.

The yield of land-tax and income-tax for the last six years has, in round figures, been as follows:—

Year.	Land-tax.	Income-tax.
	£	£
1898–9	298,000	115,500
1899–1900	294,000	129,000
1900–1	294,000	173,000
1901–2	313,000	179,000
1902–3	296,000	201,000
1903–4	335,000	221,000

Rates of Tax.

The rates of tax at present are as follow: The ordinary land-tax is 1d. in the pound; the mortgage tax, $\frac{3}{4}$d.; the graduated tax commences at £5,000, at $\frac{1}{16}$d. in the pound on the unimproved value, and rises to 3d. where the unimproved value of an owner's land is £210,000, or exceeds that sum. The ordinary tax on Native land occupied by Europeans is $\frac{1}{2}$d. in the pound. For taxpayers other than companies the rate of income-tax is 6d. in the pound on the first taxable £1,000—that is, after deducting the £300 exemption—and 1s. in the pound on any excess over £1,000. A person having an annual income of £1,900 would be thus taxed: £300 would be exempted; £1,000 would pay 6d. in the pound; and the remaining £600, 1s. in the pound: making a total of £55 a year. The tax on an income of £400 would be at 6d. on £100, equal to £2 10s. Income-tax is payable by companies, at the uniform rate of 1s. in the pound.

The schedule of rates of graduated land-tax is as follows:—

Where the value is	£5,000 and is less than £7,000,	one-sixteenth of a penny in the pound sterling.
Where the value is	£7,000 and is less than £9,000,	two-sixteenths of a penny in the pound sterling.
Where the value is	£9,000 and is less than £11,000,	three-sixteenths of a penny in the pound sterling.
Where the value is	£11,000 and is less than £13,000,	four-sixteenths of a penny in the pound sterling.
Where the value is	£13,000 and is less than £15,000,	five-sixteenths of a penny in the pound sterling.
Where the value is	£15,000 and is less than £17,500,	six-sixteenths of a penny in the pound sterling.

Where the value is	£17,500 and is less than £20,000,	seven-sixteenths of a penny in the pound sterling.
Where the value is	£20,000 and is less than £22,500,	eight-sixteenths of a penny in the pound sterling.
Where the value is	£22,500 and is less than £25,000,	nine-sixteenths of a penny in the pound sterling.
Where the value is	£25,000 and is less than £27,500,	ten-sixteenths of a penny in the pound sterling.
Where the value is	£27,500 and is less than £30,000,	eleven-sixteenths of a penny in the pound sterling.
Where the value is	£30,000 and is less than £35,000,	twelve sixteenths of a penny in the pound sterling.
Where the value is	£35,000 and is less than £40,000,	thirteen-sixteenths of a penny in the pound sterling.
Where the value is	£40,000 and is less than £45,000,	fourteen-sixteenths of a penny in the pound sterling.
Where the value is	£45,000 and is less than £50,000,	fifteen-sixteenths of a penny in the pound sterling.
Where the value is	£50,000 and is less than £55,000,	one penny in the pound sterling.
Where the value is	£55,000 and is less than £60,000,	one penny and one-sixteenth of a penny in the pound sterling.
Where the value is	£60,000 and is less than £65,000,	one penny and two-sixteenths of a penny in the pound sterling.
Where the value is	£65,000 and is less than £70,000,	one penny and three-sixteenths of a penny in the pound sterling.
Where the value is	£70,000 and is less than £75,000,	one penny and four-sixteenths of a penny in the pound sterling.
Where the value is	£75,000 and is less than £80,000,	one penny and five-sixteenths of a penny in the pound sterling.
Where the value is	£80,000 and is less than £85,000,	one penny and six-sixteenths of a penny in the pound sterling.
Where the value is	£85,000 and is less than £90,000,	one penny and seven-sixteenths of a penny in the pound sterling.
Where the value is	£90,000 and is less than £95,000,	one penny and eight-sixteenths of a penny in the pound sterling.
Where the value is	£95,000 and is less than £100,000,	one penny and nine-sixteenths of a penny in the pound sterling.
Where the value is	£100,000 and is less than £105,000,	one penny and ten-sixteenths of a penny in the pound sterling.
Where the value is	£105,000 and is less than £110,000,	one penny and eleven-sixteenths of a penny in the pound sterling.
Where the value is	£110,000 and is less than £115,000,	one penny and twelve-sixteenths of a penny in the pound sterling.

Where the value is £115,000 and is less than £120,000, one penny and thirteen-sixteenths of a penny in the pound sterling.

Where the value is £120,000 and is less than £125,000, one penny and fourteen-sixteenths of a penny in the pound sterling.

Where the value is £125,000 and is less than £130,000, one penny and fifteen-sixteenths of a penny in the pound sterling.

Where the value is £130,000 and is less than £135,000, twopence in the pound sterling.

Where the value is £135,000 and is less than £140,000, twopence and one-sixteenth of a penny in the pound sterling.

Where the value is £140,000 and is less than £145,000, twopence and two-sixteenths of a penny in the pound sterling.

Where the value is £145,000 and is less than £150,000, twopence and three-sixteenths of a penny in the pound sterling.

Where the value is £150,000 and is less than £155,000, twopence and four-sixteenths of a penny in the pound sterling.

Where the value is £155,000 and is less than £160,000, twopence and five-sixteenths of a penny in the pound sterling.

Where the value is £160,000 and is less than £165,000, twopence and six-sixteenths of a penny in the pound sterling.

Where the value is £165,000 and is less than £170,000, twopence and seven-sixteenths of a penny in the pound sterling.

Where the value is £170,000 and is less than £175,000, twopence and eight-sixteenths of a penny in the pound sterling.

Where the value is £175,000 and is less than £180,000, twopence and nine-sixteenths of a penny in the pound sterling.

Where the value is £180,000, and is less than £185,000, twopence and ten-sixteenths of a penny in the pound sterling.

Where the value is £185,000 and is less than £190,000, twopence and eleven-sixteenths of a penny in the pound sterling.

Where the value is £190,000 and is less than £195,000, twopence and twelve-sixteenths of a penny in the pound sterling.

Where the value is £195,000 and is less than £200,000, twopence and thirteen-sixteenths of a penny in the pound sterling.

Where the value is £200,000 and is less than £205,000, twopence and fourteen-sixteenths of a penny in the pound sterling.

Where the value is £205,000 and is less than £210,000, twopence and fifteen-sixteenths of a penny in the pound sterling.

Where the value is £210,000 or exceeds that sum threepence in the pound sterling.

"THE GOVERNMENT VALUATION OF LAND ACT, 1896."

The above Act provides for the periodical valuation of all landed properties in New Zealand, and for that purpose the colony is divided into special districts.

The first valuation was made as at 31st March, 1898, since which date valuations in many parts of the colony have been revised as circumstances required. An Amendment Act passed during the session of 1900 contains the amendments which four years' experience of the original Act showed to be desirable. As the principle of the original Act remains unaltered, the amendments are practically confined to the machinery clauses and the clearer definition of terms.

The valuations are used for the following purposes: Land-tax, local rates (in cases where rates are levied on the capital or on the unimproved value), stamp duties, and duties under "The Deceased Persons' Estates Duties Act, 1881"; for advances and investments on mortgage of land made by the Post Office, Government Insurance Department, Public Trust Office, Government Advances to Settlers Office, and the Commissioners of the Public Debts Sinking Funds. The valuation is also used for the guidance of the Government in transactions under "The Land for Settlements Act, 1894," and "The Public Works Act, 1894."

Valuations are supplied by the Department on payment of the prescribed fee.

The cost of making the valuation is borne principally by the Valuation Department, the Land- and Income-tax Department, the Advances to Settlers Office, and the local authorities using the valuation, while separate fees, for supplying individual valuations to those requiring them, are charged by regulation.

RATING ON UNIMPROVED VALUE OF LAND.

"The Rating on Unimproved Value Act, 1896," was passed by the General Assembly to afford local bodies the opportunity of adopting the principle of rating which is expressed in the title of the measure. It is entirely at the option of the bodies to adopt the system, and provision is made for a return to the old system of rating, if desired, after three years' experience of the new one. The Act provides that a proportion of the ratepayers on the roll, varying from 25 per cent. where the total number does not exceed 100, to 15 per cent. where the number exceeds 300, may by demand in writing, delivered to the chairman of the district, require that a proposal to rate property on the basis of the unimproved value may be submitted to the ratepayers, whose votes shall be taken between twenty-one and twenty-eight days after delivery of the demand. The poll is to be taken in the same manner as in case of a proposal to raise a loan in the district under "The Local Bodies' Loans Act, 1901."

Under the original Act it was necessary for a minimum number of one-third of the ratepayers to vote, and a majority of their votes carried the proposal. Now, under "The Local Government Voting Reform Act, 1899," the question of adoption or otherwise is decided by a bare majority of the valid votes recorded, irrespective of the number of ratepayers who have voted.

A rescinding proposal can be carried at a poll by the same means as one for adoption, but not until after three years have elapsed, and, *vice versâ*, rejection of a proposal bars its being again brought forward for a similar period. However, in the case of past polls at which the proposal to adopt the Act was rejected solely on account of an insufficient number of ratepayers recording their votes, it is now provided that a new poll may be held at any time.

The valuation-roll is supplied to the local authority by the Valuer-General under the provisions of "The Government Valuation of Land Act, 1896," and its amendment of 1900, and the definitions of "capital value," "improvements," "unimproved value," and "value of improvements" found in these Acts apply also to the Rating on Unimproved Value Act. Provision is made for adjustment of rating powers given under previous Acts to the Act of 1896 by fixing equivalents. Thus a rate of 1s. in the pound on the annual value under former Acts is to be considered equal to $\frac{3}{4}$d. in the pound on the capital value under the Act of 1896.

The adjustments are to be made so that the rates on the unimproved value shall be such as to produce as much as, but not more than, the rates under "The Rating Act, 1894." For instance, supposing a local authority has a rating power up to $\frac{3}{4}$d. in the pound on the capital value, then it can levy any rate in the pound on the unimproved value of land in its district *so long as the producing capacity of such rate is not greater than would be the producing capacity of a* $\frac{3}{4}$*d. rate on the capital value of the district.* When a fixed rate, under the older system of rating, is security for a loan, the Controller and Auditor-General is given power to interfere and fix the new rate himself if of opinion that the new rate on the unimproved value does not afford equally good security to the one to be given up.

The operation of the Act does not apply to water, gas, electric light, sewage, nor hospital and charitable aid rates.

Particulars will be found in Section XV., "Local Governing Bodies," of the local bodies that have, up to 31st March, 1904, submitted the question of the adoption of the Act to the ratepayers, and the result of the polling in each case.

STATE FIRE INSURANCE.

In the year 1903 was passed an Act "to establish a State Fire Insurance Office and to make other provisions for the insurance and protection of insurable property in New Zealand against loss or damage by fire."

The statute provides for the establishment of an office to be administered by a General Manager appointed by the Governor, and for the necessary staff—not subject to the laws regulating the Civil Service.

There is provision for the constitution of a Board, to consist of the General Manager, the Colonial Treasurer, the Government Insurance Commissioner, and two other persons (not being in the Civil Service) appointed by the Governor. The latter hold office for two years, with eligibility for reappointment, and are to be remunerated according to appropriation by Parliament.

In order to provide capital for the business, the Treasurer, on being authorised by the Governor in Council, is empowered to raise from time to time such sums as he thinks fit, not exceeding in the whole £100,000, any of which may, if found convenient, be raised in the colony.

In the event of such capital not being found sufficient, the Treasurer, on being authorised by the Government, is empowered to raise additional capital as required. To do this the General Manager must convene a meeting of the Board, and, if the Board approves, by requisition under his seal apply to the Treasurer for what is deemed necessary by way of supplementary capital and additional funds (not exceeding £20,000 at a time) to carry on business until the pleasure of Parliament is signified.

The rate of interest on debentures, scrip, or other security issued in respect of any sum raised under the Act may not be higher than 4 per cent.

For purposes of sinking fund, it is provided that at the expiration of every triennial period during the currency of securities the General Manager shall pay over to the Public Trustee one-half the net profits to the credit of a State Fire Insurance Sinking Fund Account. As soon as the Treasurer is satisfied that the accumulations of sinking fund will suffice to redeem the securities at maturity he is to notify the Public Trustee and the Manager, whereupon the payments of sinking fund cease, and subsequent accretions of interest are paid into Reserve Fund.

All moneys payable to the General Manager are to be paid to the credit of the State Fire Insurance Account, out of which shall be payable, without further appropriation than the Act under notice, all costs and expenses, salaries, fire losses, and other outgoings of the business—including interest payable on securities issued.

Provision is made for the General Manager, with consent of the Board, to buy, sell, or lease land, with or without buildings.

For the period ending 31st December following the expiration of three years after the first insurance is effected, and triennially from then, one-half of the net *surplus* profits are to go to a Reserve Fund and be invested by the General Manager. The other half is to be devoted to bonuses payable to such persons as are actual insurers in the State Fire Insurance Office. The division is to be made on a proportional basis, relatively to premiums paid, and as soon after the close of the triennial period as possible.

OLD-AGE PENSIONS.

In 1898 a Bill, introduced into Parliament by the Right Hon. R. J. Seddon, Premier, became law, which provided for the payment of old-age pensions out of the Consolidated Fund (revenue of the General Government) to persons duly qualified, without contribution by the beneficiaries. A Bill had been previously introduced in 1897, which, as amended by the House of Representatives, was transmitted to the Legislative Council, but thrown out by that body. The original Act has been amended in several directions by amending Acts passed in 1900, 1901, and 1902.

A Registrar at Wellington has the general administration of the Act, subject to the control of the Colonial Treasurer; and, for the purposes of administration, the colony is divided into seventy-four districts, each in charge of a Deputy-Registrar. In several instances the Deputy-Registrar is the paid officer of the Old-age Pensions Department, but the duties of this office are mostly undertaken by Clerks of Stipendiary Magistrate's Courts.

The Act does not apply to,—

(1.) Aboriginal natives of New Zealand to whom moneys other than pensions are paid out of the sums appropriated for Native purposes by "The Civil List Act, 1863."
(2.) Aliens.
(3.) Naturalised subjects, except such as have been naturalised for the period of one year next preceding the date on which they establish their pension-claims.
(4.) Chinese or other Asiatics, whether naturalised or not.

The Act, however, does apply to aboriginal natives of New Zealand other than those specified above.

Every person of the full age of sixty-five years or upwards, other than above stated, is entitled to a pension who fulfils the following conditions:—

(1.) That he is residing in the colony on the date when he establishes his claim to the pension, and remains in the colony.
(2.) That he has so resided continuously for not less than twenty-five years immediately preceding such date:

Provided that continuous residence in the colony shall not be deemed to have been interrupted by occasional absence therefrom unless the total period of all such exceeds two years; nor, in the case of a seaman, by absence therefrom whilst serving on board

a vessel registered in and trading to and from the colony if he establishes the fact that during such absence his family or home was in the colony.

[NOTE.—A total period of four years' absence is allowed where the applicant was not absent during the twelve months ended 31st October, 1898, and where the total period of actual residence is not less than twenty-five years.]

(3.) That during the period of twelve years immediately preceding such date he has not been imprisoned for four months, or on four occasions, for any offence punishable by imprisonment for twelve months or upwards, and dishonouring him in the public estimation.

(4.) That during the period of twenty-five years immediately preceding such date he has not been imprisoned for a term of five years with or without hard labour for any offence dishonouring him in the public estimation.

(5.) That during the period of twelve years immediately preceding such date the claimant has not, for a period of six months or upwards, if a husband, deserted his wife, or without just cause failed to provide her with adequate means of maintenance, or neglected to maintain such of his children as were under the age of fourteen years; or, if a wife, deserted her husband or such of her children as were under that age.

(6.) That he is of good moral character, and is, and has for five years immediately preceding such date been, leading a sober and reputable life.

(7.) That his yearly income does not amount to fifty-two pounds or upwards, or the joint income of husband and wife, including pension, does not exceed seventy-eight pounds.

(8.) That the net capital value of his accumulated property does not amount to two hundred and seventy pounds or upwards.

(9.) That he has not directly or indirectly deprived himself of property or income in order to qualify for a pension.

The full amount of pension is eighteen pounds per annum (£18), diminished by,—

(1.) One pound for every complete pound of income above thirty-four pounds.

(2.) One pound for every complete fifteen pounds of net accumulated property.

Income is money or profits derived by any means or from any source, and includes reasonable cost of board and lodging up to £26, but not any payment by way of sick-allowance or funeral benefits from any registered Friendly Society, nor any pension payable under the Act.

Net accumulated property is the capital value of all real and personal property owned by a person to the extent of his beneficial estate or interest therein, less the sum of £50, and less any mortgages existing on such property.

Where the claimant is married the yearly income is deemed to be not less than half of the total yearly incomes of both husband and wife, and the net accumulated property is deemed to be not less than half the total net accumulated property of both, provided that the actual income or property of either is not reduced by this condition.

Any person otherwise qualified to receive a pension who owns property on which he resides, and the value of which does not exceed £300, may transfer the said property to the Public Trustee,

and the value of such property shall be deducted from the capital value of his total accumulated property for the purpose of computing the amount of his pension. The pensioner is permitted to reside on the property rent free during his life time, but must pay all rates and charges thereon. If a husband and wife, both being pensioners, are living together, and one should die, the survivor shall be permitted to continue to reside on the property. On the death of the pensioner or survivor, or where the pensioner is no longer entitled to a pension, the Public Trustee shall sell the property, and after deducting from the proceeds of the sale the amount of pension paid as a consequence of the transfer of the property, together with his commission and interest at the rate 4 per cent., shall pay the balance to the person or persons entitled thereto. Provision is made for a pensioner or survivor to pay such amounts as aforesaid at any time, with the view of obtaining a retransfer of the property.

Each applicant for a pension must make application on a printed form to the Deputy-Registrar of the district in which he resides, and the Deputy-Registrar is required to certify that the questions and answers therein have been read over to the applicant.

On receiving an application the Deputy-Registrar proceeds at once to verify the applicant's statements by a series of inquiry forms, which are sent, among other places, to the various banks and insurance companies, the Post-Office Savings-Bank, the Tax and Valuation Departments, and, in addition, the Police Department is asked to furnish a report. The claim is then transmitted with the results of the inquiries to the Stipendiary Magistrate presiding at the nearest Court, and a date is fixed for the personal examination of the pensioner. If the claim is admitted, the Magistrate issues a certificate setting out the amount of the pension granted for the first year, which is at once forwarded to the Registrar at Wellington, who issues a pension-certificate.

Payment of the pension is made by twelve monthly instalments through the Postal Department, sufficient money being remitted each month to cover the payments falling due in that month. No payment is made without production of the pension-certificate. Instalments are payable on the first day of the month, but may be collected up to the first day of the month following, after which date the special authority of the Colonial Treasurer is required before payment can be made.

For the purpose of ascertaining if a pensioner is entitled to a renewal of his pension, he is required, shortly before the expiry of the pension certificate held by him, to furnish to the Deputy-Registrar a statement of his income during the past year, and also of his property, and this statement is dealt with and submitted to the Magistrate for investigation in the same manner as an original claim. The Magistrate issues a certificate as before, which is forwarded to the Registrar, who issues a fresh pension-certificate, the expired certificate being retained by the Postal Department on payment of the last instalment.

If a pensioner is physically unfit to draw his pension in person he may appoint an agent, who requires an authority signed by a Magistrate before he can collect an instalment.

Pensions granted to persons maintained by a charitable institution are paid to the governing body of such institution on production of an authority likewise signed by a Magistrate.

No payment is made of an instalment which falls due while the pensioner is in gaol, an asylum, or out of the colony. On the death of a pensioner, the portion of the instalment accruing to date of death may be paid if applied to defray burial expenses.

All deaths over the age of sixty-five are reported to the Registrar by the Registrars of Deaths throughout the colony.

If a pensioner is convicted of drunkenness, the convicting court may forfeit one or more instalments, or cancel the pension outright.

Provision is also made for a Magistrate cancelling during its currency any pension-certificate the holder of which ceases to qualify for a pension.

If the Registrar has reason to believe that any pension has been improperly obtained, he may suspend payment and cause inquiry to be made before a Magistrate; and if a pensioner becomes possessed of property or income in excess of the amount allowed by law the Registrar may apply to have the pension varied or cancelled.

Any person who by a wilfully false statement obtains, or attempts to obtain, a pension, is liable to six months' imprisonment, as also is any person who aids or abets such person.

Where it is found on inquiry that a pension has been overpaid, and the Magistrate is of opinion that the over-payment was obtained by fraud, the pensioner is liable, in addition to imprisonment, to a penalty of double the amount paid in excess.

If, on the death of a pensioner, or the wife or husband of a pensioner, it is found that he, or either of them, was possessed of property in excess of the amount allowed by law in respect of the amount of pension granted, double the amount of pension over-paid may be recovered from the estate so found to be in excess.

By the 31st March, 1899, there were 7,443 pensions, which represented a yearly payment of £128,082. A year later the number of pensions in force was 11,285, representing a yearly payment of £193,718. On the 31st March, 1901, the number in force was 12,405, the yearly payment for these being £211,965; on the 31st March, 1902, there were 12,776 pensions, and the amount was £217,192; on the 31st March, 1903, the number in force was 12,481 (including 892 Maoris), representing a liability of £211,594; and on the 31st March, 1904, the number of pensions was 11,926 (729 Maoris), and the amount payable thereon £200,915.

The number of pensions in force in each of the old-age pension districts was:—

NUMBER AND ANNUAL VALUE OF PENSIONS GRANTED TO EUROPEANS AND MAORIS IN FORCE ON THE 31ST MARCH, 1904.

District.	Number.		Annual Value.		
	Europeans.	Maoris.	£	s.	d.
Auckland*	1,137	11	19,434	0	0
Coromandel	78	30	1,893	0	0
Dargaville	55	..	926	0	0
Hamilton	136	13	2,496	0	0
Helensville	41	..	722	0	0
Kaitaia	17	39	933	0	0
Mangonui	9	18	456	0	0
Maungaturoto	35	..	553	0	0
Otahuhu	180	10	3,007	0	0
Raglan	12	20	517	0	0
Rawene	14	82	1,571	0	0
Rotorua	11	45	990	0	0
Russell	56	81	2,246	0	0
Taupo	1	25	444	0	0
Warkworth	67	..	1,006	0	0
Whangarei	131	1	2,213	0	0
Whangaroa	11	24	597	0	0
Thames	247	4	4,276	0	0
Opotiki	15	29	775	0	0
Paeroa	59	6	1,112	0	0
Tauranga	32	39	1,231	0	0
Te Aroha	32	1	570	0	0
Whakatane	5	47	931	0	0
Gisborne	57	31	1,473	0	0
Port Awanui	5	16	378	0	0
Napier	256	1	4,305	0	0
Dannevirke	147	1	2,457	0	0
Waipawa	23	..	398	0	0
Wairoa	10	43	865	0	0
New Plymouth	180	20	3,301	0	0
Stratford	25	..	426	0	0
Wanganui	175	10	3,193	0	0
Hawera	62	2	1,127	0	0
Marton	73	6	1,351	0	0
Patea	20	1	353	0	0
Wellington	531	3	9,221	0	0
Feilding	90	6	1,621	10	0
Greytown	79	1	1,331	0	0
Masterton	82	1	1,421	0	0
Otaki	55	12	1,153	0	0
Pahiatua	31	..	475	0	0
Palmerston North	154	4	2,672	0	0
Nelson	245	4	4,031	0	0
Motueka	72	..	1,145	0	0
Blenheim	142	2	2,422	0	0
Havelock	7	..	126	0	0
Christchurch	1,211	3	20,017	0	0
Akaroa	34	6	626	0	0

* Two hundred pensions were transferred to this district during the year from the Helensville district.

NUMBER AND ANNUAL VALUE OF PENSIONS GRANTED—*continued.*

District.	Number.		Annual Value.
	Europeans.	Maoris.	
			£ s. d.
Amberley	8	..	133 0 0
Ashburton	202	..	3,370 0 0
Culverden	5	..	81 0 0
Kaiapoi	274	6	4,641 0 0
Kaikoura	21	2	389 0 0
Timaru	143	..	2,429 0 0
Fairlie	4	..	63 0 0
Temuka	114	..	1,856 0 0
Waimate	93	2	1,543 0 0
Greymouth	461	..	8,160 0 0
Reefton	135	..	2,388 0 0
Hokitika	489	2	8,474 0 0
Westport	233	4	4,109 0 0
Oamaru	210	2	3,563 0 0
Dunedin	943	1	16,046 0 0
Balclutha	135	..	2,303 0 0
Clyde	102	..	1,800 0 0
Lawrence	193	..	3,239 0 0
Milton	124	..	1,982 0 0
Naseby	95	..	1,608 0 0
Palmerston South	53	..	870 0 0
Port Chalmers	164	5	2,675 0 0
Invercargill	611	1	10,185 0 0
Queenstown	105	..	1,817 0 0
Riverton	130	4	2,322 0 0
Chatham Islands	3	2	82 0 0
Total	11,197	729	£200,915 0 0

With the above, a statement of the cost of administration year by year is furnished.

COST OF ADMINISTRATION OF "THE OLD AGE PENSIONS ACT, 1898," FOR THE FINANCIAL YEARS ENDED

—	31 March, 1900.	31 March, 1901.	31 March, 1902.	31 March 1903.	31 March, 1904.
	£	£	£	£	£
Salaries and clerical assistance ..	1,374	1,509	1,647	2,630	2,681
Travelling-expenses and interpreters' fees	309	194	190	384	274
Contributions to Post Office ..	466	500	500	500	520
Contingencies	211	176	138	245	180
Rent of offices	..	36	60	46	..
Total	2,360	2,415	2,535	3,805	3,655

The following particulars are taken from the Registrar's report on the transactions for the year ended 31st March, 1904:—

"The number of pensions in force on the 31st March, 1904, was 11,926, representing a liability of £200,915—an average per pension of £16 17s. Of this number, 729 were Maoris. The sexes of the 11,926 pensioners were—Europeans, 6,708 males and 4,489 females; Maoris, 371 males and 358 females. Of the total number of pensioners since the Act came into force 3,707 were not married, 8,162 married, and 6,692 widowed; making a total of 18,561.

"During the financial year just ended the number of new pensions granted was 1,063.

"The total number of pensions voided during the year was 1,618, made up as follows: Deaths, 928; cancellations, 690."

NUMBER OF PENSIONS GRANTED SINCE THE ACT CAME INTO OPERATION; NUMBER OF DEATHS, CERTIFICATES CANCELLED; NUMBER AND LIABILITY IN RESPECT OF PENSIONS IN FORCE AT END OF EACH YEAR.

Year ending the 31st March.	Number of Pensions granted.	Deaths.	Cancellations.	In Force at End of Year.	Liability each Year.
					£
1899	7,487	38	6	7,443	127,319
1900	4,699	786	71	11,285	193,718
1901	2,227	815	292	12,405	211,965
1902	1,694	935	388	12,776	217,192
1903	1,391	1,064	622	12,481	211,594
1904	1,063*	928	690	11,926	200,915
Totals ..	18,561	4,566	2,069	..	..

* Including forty-four pensions previously cancelled and now reinstated.

AGES OF EUROPEAN PENSIONERS ON THE ROLLS AT 31ST MARCH, 1904.

At Age	Number.	At Age	Number.	At Age	Number.
65 ..	60	78 ..	352	91 ..	13
66 ..	444	79 ..	308	92 ..	10
67 ..	636	80 ..	244	93 ..	7
68 ..	730	81 ..	213	94 ..	2
69 ..	928	82 ..	151	95 ..	1
70 ..	1,468	83 ..	157	96 ..	1
71 ..	1,207	84 ..	137	97 ..	1
72 ..	947	85 ..	101	100 ..	1
73 ..	803	86 ..	55	101 ..	1
74 ..	707	87 ..	45	103 ..	2
75 ..	554	88 ..	45		11,197
76 ..	413	89 ..	26		
77 ..	408	90 ..	19		

PREFERENTIAL AND RECIPROCAL TRADE.

Preferential Trade.

The Act passed in 1903 is referred to on page 101 of Part I., and the articles *not of British origin*, with the additional preferential duties which have been imposed on them, are specified in detail after the tariff in force under "The Customs Laws Consolidation Act, 1882."

No duty is payable on tea grown in British Dominions, except when imported in packets not over 1 lb. in weight.

On pages 190–192 the original rates and additional duties are set out in still clearer form in the remarks under "Customs Revenue."

Reciprocal Trade.

Where any country, *being part of the British Dominions*, reduces or abolishes, or proposes to do so, the duty on any product or manufacture of New Zealand, the Governor is authorised to enter into an agreement to reduce or abolish the duty on any articles the produce or manufacture of such country to an extent that the estimated revenue so remitted shall equal as nearly as possible the remission by that country. Such agreements, however, require ratification by Parliament.

Similarly, where any country *not being part of the British Dominions*, reduces or abolishes, or proposes to do so, the duty on any product or manufacture of New Zealand, the Governor is authorised, subject to or by virtue of a treaty with His Majesty, to negotiate for an agreement to reduce or abolish the duty on any articles the produce or manufacture of such country to an extent that the estimated revenue so remitted in New Zealand shall equal as nearly as possible what is remitted by that country, subject to Parliamentary ratification.

SECTION II.

AGRICULTURE IN NEW ZEALAND

[By M. Murphy, F.L.S.]

It is generally admitted that there is no part of the British dominions where agriculture, in its widest sense, can be carried on with so much certainty and with such good results as in New Zealand. The range of latitude, extending as it does from 34° to 47° South, secures for the colony a diversity of climate which renders it suitable for all the products of subtropical and temperate zones, while an insular position protects it from the continuous and parching droughts which periodically inflict such terrible losses on the agriculturist and pastoralist of Australia and South America.

Again, the climate, although somewhat variable, never reaches the extremes of heat or cold. So genial, indeed, is it that most animals and plants, when first introduced to the colony, assume a vigour unknown to them before.

North Island.

All the best forage-plants and grasses thrive most admirably, continuing to grow throughout the year with little intermission. Stock of every sort thrive and fatten rapidly on the pastures, coming to maturity at an early age without the aid of roots or condimental foods. All cereals flourish equally well, more especially Indian corn, which produces from fifty to eighty bushels per acre.

So full is the soil of plant-food that several continuous crops of potatoes or cereals may be taken with little apparent exhaustion. Wheat, oats, and barley thrive where the soil is not too rich; otherwise they produce enormous crops of straw, without a corresponding yield of corn. The tobacco-plant thrives well, as do also hops and sorghum, broom-corn, peanut, hemp, ramee or rhea (China grass), together with a large variety of economic plants, the growth of which will one day afford employment for a large population. In addition to these, all the British, Chinese, and Japanese fruits, with oranges, lemons, limes, olives, and vines (in the northern part), flourish abundantly, requiring but ordinary care. Potatoes are largely grown, and yield heavy crops.

Much of the country along the south-west and west coast is now taken up, and the primeval forest is fast disappearing before the settler's axe. For the most part, the soil is fertile, and the growth of grass and clover is extremely rapid and vigorous when sown on the surface after the felled timber has been destroyed by fire.

To the British husbandman it will seem almost incredible that the best pasture-grasses grow and thrive as they do with no other preparation than the ashes resulting from the burnt timber—no ploughing and no previous loosening of the soil—yet, in less than a year from the date of scattering the seed, this same land will fatten from five to six sheep per acre.

So rapidly are these fertile forest-lands being cleared and converted into pastures that the demand for stock (principally dairy) has greatly increased, and this demand must continue for a series of years before it is fully met.

Those who in the past have watched the progress of New Zealand, especially of the North Island, have always maintained that when the Maori difficulties and other impediments to settlement were over, the prosperity of the country would advance at a very rapid rate. The time has now come, and all that is required to expedite the coming prosperity is the settlement of our lands by a thrifty class of settlers.

There are millions of acres yet unoccupied, a great portion of which is of good quality, and only waiting the hand of man to make it carry, with very little cost, large herds of dairy stock, with flocks of long-wool and crossbred sheep. The west coast of the island is essentially a cattle-country. Considerable areas in the midland districts are adapted to long-wool sheep, as is also the country along the east coast. Much of the country may be described as being good sheep-land, a large portion of which is quite capable of carrying two sheep to the acre, and some of it as many as three or four.

Middle Island.

If the North Island has a splendid inheritance in her forests, the Middle Island can boast of her magnificent plain-lands, rolling downs, and vast mountain ranges, all of which, to a greater or less degree, have already been made to contribute to the wealth of the colony.

The central portion of the Middle Island presented to the first-comers a vast plain, covered only with waving tussock-grass, offering little or no obstruction to the plough.

Travelling south, the country assumes a different character: easy, undulating downs, well watered, here and there interspersed with fertile plains, the greater portion admirably adapted for agriculture, and all of it suitable for pastoral purposes.

The climate of the Middle Island is not so warm in summer nor so mild in winter as that experienced in the North Island. However, as has already been stated, there are no extremes of heat or cold. Much more might be said in praise of this portion of the colony. It is deemed necessary to say so much in order that readers may better comprehend the comparative ease with which every kind of farming is carried on in New Zealand as compared with other countries less favourably situated.

Agricultural Statistics.

The following *resumé* of the statistics, as published in the *Gazette* for the past season, is sufficient to indicate the trend of the agricultural and pastoral industries; fuller particulars will be found in the statistical portion of this book. It will be seen that there has been a decrease in the areas devoted to cereal crops, and an increase in that under sown grasses throughout the colony.

In wheat there is an increase of 35,991 acres; and in barley, 6,760 acres. There is, however, a decrease in oats of 92,019 acres, inclusive of 17,750 acres damaged by rust; small decreases in the area under rye and maize are also noted. The land laid down in pasture increased by 140,956 acres, and in turnips there were 15,829 acres increase.

The stock statistics show that horses have increased by 11,295 head, cattle by 132,884, and pigs by 32,851.

The sheep returns, made up to 30th April, 1903, afford convincing evidence of the folly of the indiscriminate slaughter of the ewe lambs of the colony to meet the ever-increasing demand of the frozen-meat trade. The total number in April, 1902, was 20,342,727, the highest total yet reached by the colony. But the figures for April, 1903, show only 18,954,553, a decrease of 1,388,174.

The Farming Outlook.

Before the advent of the freezing-chamber, sheep-farming could only be carried on profitably on large areas with large flocks, for the reason that wool and tallow were the only marketable products, the sale of fat sheep and lambs being confined to supplying the demand for local consumption. The development of the meat-export trade has completely altered the condition of things from an agricultural point of view. Almost every farmer, small and large, now keeps his flock of breeding-ewes for the production of lambs for freezing, thereby necessitating the growth of root and forage crops, and so bringing about a greatly improved style of farming throughout the colony when compared with the previous system of universal corn-growing.

The season of 1903–1904 has, on the whole, proved somewhat disappointing to the grain-growers of the colony. The want of sufficient moisture during the critical period—viz., the growing-season of the cereal-crops—caused much anxiety to farmers generally. Subsequent rains, however, resulted in fair average yields all round.

Feed has seldom been more abundant than was the case during the past autumn, and, indeed, up to the time of writing these notes (July). This is fully accounted for by the fact that the pastoral lands have not been stocked up to their carrying-capacity owing to the phenomenal prices which have ruled for a lengthened period for store sheep, and, indeed, stock of all kinds. The increasing development of the dairy industry (notwithstanding the want of an efficient milking-machine) keeps the price of dairy stock up to a high level.

The demand for dairy-farms continues as brisk as ever, the natural result of which is that suitable land for the purpose has advanced from 25 to 50 per cent. in value during the last decade. It would be unreasonable to expect this rise in value to continue, either for dairying or for agricultural lands, in the face of the strides being made in these industries in other parts of the world. In connection with this subject, the following information will be interesting as well as instructive, viz: The area of land under occupation in New Zealand at the present time amounts to 36,476,481 acres, of which 705,443 acres were under cereals this season, 788,321 acres in green crops, in sown grasses 11,949,171 acres, in tussock or native grass 22,877,322 acres, fallow lands 61,069 acres, and in gardens, plantations, and orchards 95,155 acres.

As regards the future outlook for agricultural produce, it will be useless to anticipate a continuance of high prices such as those experienced for some years past, the result of droughts and other causes. The phenomenal yields of wheat and other cereals throughout the Australasian Commonwealth has practically closed those markets against New Zealand produce of all kinds. According to returns to hand South Australia produced 13,000,000 bushels of wheat—the largest crop since 1890—the average yield per acre being 8·29 bushels. Victoria had 1,968,599 acres under wheat, which yielded 14½ bushels per acre. Oats returned 31 bushels to the acre, barley 25½ bushels, and maize 77 bushels per acre. New South Wales grew 1,561,111 acres of wheat, yielding 27,334,141 bushels, or an average of 17·5 bushels per acre. The area under maize was 226,834 acres, yielding 6,836,740 bushels. It is, therefore, extremely improbable that any great demand will come from the Commonwealth for this year's produce.

Wheat.

The Canterbury Plains, the great wheat-growing district of the Middle Island, extend 150 miles north and south, running inland from the sea for forty miles, the whole forming an area of over 3,000,000 acres. A great portion of this vast plain is admirably adapted for the production of wheat, barley, and oats, and all the best cultivated grasses, the growing of which has been carried on extensively since the foundation of the colony. The total area under wheat for threshing in the colony for the season 1903–1904 was 230,346 acres (exclusive of areas grown for chaffing and fed off), of which 158,792 acres were grown in Canterbury, the average yield throughout the colony being 34·26 bushels per acre. The land is for the most part free from stones or impediments of any kind. Single-furrow ploughs are now rarely seen, double- and three-furrow ploughs being in general use, and an occasional steam plough. Three horses, occasionally four, with a man or a boy, can turn over three acres per day on the plains, at a cost of 5s. or 6s. per acre. A stroke of the disc or other harrow, followed by the seed-drill and light harrows, completes the operation of sowing.

Seed-sowing commences in May, and can be continued as weather permits through the winter, and in the heavy swamp land (drained) on into September and even October. From 1¼ to 1½ and 2 bushels of seed per acre are usually sown, the quantity increasing as the season advances.

Oats and Barley.

Otago and Southland districts excel in the production of oats, which is their principal cereal crop. The total area under this cereal harvested for the season 1903–1904 was 391,640 acres, being a decrease as compared with the previous season of 92,019 acres.

The yield of oats in Otago and Southland varies from 40 to 80 bushels per acre, the cost of production being about the same as wheat—viz., £2 per acre when grown from grass-land, and £1 10s. from stubble.

Malting barley, of very superior quality, is grown in Nelson and Marlborough, where the soil and climate appear to be particularly adapted to its culture.

The growing of this cereal (barley) for malting purposes requires more attention than it has yet received in this colony. It is claimed for this crop that it will show a better result than wheat, for the following reasons: (1) It is less exhaustive to the soil; (2) it gives an average yield of from 10 per cent. to 20 per cent. more than wheat; (3) the growing crop in favourable seasons can be fed off twice, or even three times, to the advantage of the subsequent yield of grain. Land of a light and calcareous nature, but unsuitable for wheat, will give a barley thin in the skin, and particularly suited for malting purposes. Barley is not a difficult crop to raise, but there are certain points that need careful attention, which, if neglected, would probably result in the production of an inferior sample, which would hardly pay for growing.

Root-crops.

Potatoes: Potatoes are largely grown throughout New Zealand. On suitable soils very heavy crops are raised, it being no uncommon thing to dig from 8 to 10 and 15 tons per acre, although the general average is much lower, for the reason that unsuitable land is frequently devoted to this crop. The area under potatoes in 1903–1904 was 31,778 acres. The bulk of the crop is planted without manure, but, where used, bonedust, superphosphate, blood-manure, or animal guano (which may be procured of first quality from the local manure manufactories), from 1 cwt. to 2 cwt. per acre, is applied with good results. The potato is, however, an expensive crop to grow, costing from £5 to £6 per acre, and it is perhaps the most precarious of all crops, being materially affected by drought, but more particularly so by early and late frosts. The crop in Canterbury for the past season, 1904, was a fair average one, yielding 6·5 tons per acre. Potato-growers admit that £1 10s. per ton off the fork will pay better than £2 after being stored for any time.

Land for potatoes is usually broken out of grass, skim-ploughed in autumn, ploughed deeply in spring, and thoroughly tilled; or potatoes may be grown in drills opened and closed with a double-furrow plough. The seed—15 cwt. per acre—is then ploughed in under every third furrow, the after-culture consisting of harrowing just as the crop is appearing over ground (by this means myriads of seedling weeds are destroyed); drill-grubbing, hoeing, horse-hoeing, and earthing-up being the subsequent operations. Heavy crops of wheat, oats, barley, beans, or peas can always be relied upon after potatoes.

*Turnips:** The turnip-crop of this season has been a fair average one on the plains of Canterbury. In the southern portion of the Island the crop was very good. The area under this crop for the season 1903–1904 was 408,659 acres, an increase of 15,829 acres as compared with the previous year.

Rape is largely grown as sheep-feed, and may be sown either in early spring or immediately after harvest, the stubble being skim-ploughed or broken up with the spring-tined cultivator. This crop is invaluable in the early spring, and may be fed off in time for oats or barley. Dairy cattle, however, should not be fed on rape, as doing so destroys the flavour of the milk. This fodder plant is more valuable for fattening lambs than the turnip; there were 118,662 acres under this crop.

Mangolds and Carrots are largely grown in some districts. They cost more money per acre than turnips to produce, as they must be hand-hoed; nor are they so suitable a crop for cleaning the land. Turnip-sowing does not commence till November or December, affording ample time for the destruction of seedling weeds; this important opportunity is largely lost in the culture of the mangold, which is usually sown in October. Mangolds are, however, an invaluable crop on a stock-farm, as they do not reach their primest condition until the turnip-supply is exhausted, usually in August. From 30 to 60 tons per acre is not an uncommon yield of these roots, often without the aid of manure, on rich swamp land.

Carrots are also a valuable crop, especially for horses; on sandy loams the yield reaches 15 to 20 tons per acre. Carrots impart a pleasant flavour to butter, and should be largely grown for dairy stock.

Seeds.

Clover: Saving clover for seed in favourable seasons is a lucrative industry, adding materially to the farmers' income. Clover is sown with a spring crop, usually of corn, lightly grazed in the following autumn, and then reserved for a crop of hay, which, according to the season, yields from 2 to 3 tons per acre when cut in November or early in December. Most farmers prefer feeding off with sheep in preference to mowing for hay. The after-growth

* Valuable information on the growing of this crop will be found under this heading in the Year-book for 1901, page 478.

is then allowed to flower and seed, which it does very freely. Thousands of humble-bees may be seen in the clover-fields during the months of January, February, and March. The seed ripens in March, and is then cut and dried, and threshed out by machines known as clover-shellers. An acre of clover may yield in hay and seed from £8 to £10. It must, however, be stated that, while a good crop of clover-seed is a most lucrative one, it is nevertheless a most precarious one. Owing to the lateness of the season of ripening, it sometimes happens that the fertilisation is imperfect, resulting in a majority of barren heads. This has given rise to a controversy as to whether the proper bee has been introduced. The point was referred to the late Miss Ormerod, the English entomologist, who settled the question in the affirmative.

White and alsike clover are now grown in considerable quantities. White clover yields enormously: as much as 300 lb. of alsike seed has been obtained per acre. These clovers are not so dependent on the action of the humble-bee for their fertilisation. They mature earlier, and are more easily threshed and cleaned than cow-grass or red-clover.

Grass-seed Saving: All the most valuable British grasses flourish throughout New Zealand. Cocksfoot has been for many years a staple product of Banks Peninsula (Akaroa County), where the soil for the most part consists of decomposed volcanic rocks and vegetable mould. Large quantities of this seed are now raised in the North Island and in many other parts of the colony as well. The seed is of the finest description, frequently weighing 20 lb. to the bushel, 12 lb. being a standard bushel. Cocksfoot thrives on a very wide range of soil, from the richest to the poorest, preferring, of course, the former. It may be found on the dry stony plains of the interior, green and healthy, when the surrounding herbage, introduced or indigenous, has given in to the heat of the summer sun.

Growing ryegrass for seed is also an important industry. The seed is usually gathered by stripping; sometimes the grass is cut and tied and afterwards threshed by machinery. The average yield is from 15 to 20 bushels per acre, weighing from 25 lb. to 32 lb. per bushel, 20 lb. being the standard weight. A common practice is to graze the land till midsummer; to take the stock off for a few weeks, and then to run the stripper over the ground. By this primitive method 10 bushels per acre are sometimes secured, being of the finest quality. Ryegrass-seed is usually in good demand; the price varies according to the season; the usual price, however, is from 2s. 6d. to 3s. 6d. and 4s. per bushel.

Many of the indigenous grasses of New Zealand are possessed of considerable feeding-value, but, unfortunately, few of them will stand too close feeding. The action of fire is especially injurious to most of them. Of recent years a great deal is being written about *Danthonia semiannularis* (one of the native oat-grasses) as a grass particularly adapted to some of the poorer soils in the North

Island, where it is said to thrive admirably; it is also said to be able to resist the action of occasional grass-fires. There are many varieties of Danthonias, from the giant, coarse-growing snow-grass or oat-grass, to the fine-leaved varieties found in almost all the natural pastures in the colony.

Small Seeds: New Zealand, from the nature of her soil and climate, offers a fine field for growing all kinds of farm and garden seeds. This circumstance has already attracted the attention of some of the larger seed-merchants of Great Britain, whose agents occasionally visit the colony with a view to inducing farmers and others to grow certain kinds of seeds. The industry is peculiarly adapted to small holdings, and well suited to young persons, the work being light and of an interesting character. Ready sale can be found for carefully grown and carefully cleaned garden-seeds if grown in quantity.

Other Crops.

Pulse: Peas and beans are largely grown for pig and horse feed, and for export; they form an excellent preparation for wheat. An extensive trade in peas of a certain description is done in the manufacturing towns of Great Britain; and efforts are now being made to secure a share of this trade for the colony by producing peas suitable for splitting for human food. The business should prove a most remunerative one. Thirty bushels of peas per acre are considered a fair crop, while 60 to 70 bushels of beans are often secured. As showing the extraordinary fertility of some of the lands in the colony, it may be mentioned that beans and wheat have been grown alternately on Kaiapoi Island for thirty years without any apparent diminution of yield, the crops of recent years being as abundant as those grown twenty-five years ago—40 to 50 bushels of wheat and 60 to 70 bushels of beans being the usual return per acre.

Cape Barley and Winter Oats: The demand for early spring feed has resulted in the growing of these plants for forage. Their extreme hardiness renders them well adapted for autumn sowing. If sown in March they are ready for feeding-off in May; they may be fed off again in July, and on till the beginning of October, when, if allowed to run to seed, they will produce 40 to 60 bushels per acre, or they may be ploughed in for turnips.

Tares are also grown, but not so largely as they deserve to be, especially for dairy stock. Mixed with oats, barley, or rye, they are excellent milk-producers; and when grown luxuriantly they destroy all kinds of weeds, and leave the land in fine condition for a spring corn-crop.

Lucerne: This permanent fodder-plant thrives admirably in most parts of New Zealand, yielding three to five cuttings in the year; and, if properly cultivated and well attended to, particularly in its early stage of growth, it will continue to yield liberal cuttings for seven or eight years, or even longer. This is a most excel-

lent crop for the small or large farmer, furnishing, as it does, an abundant supply of succulent fodder, in deeply-cultivated soils, during the drier months of midsummer, as well as in the early spring. All farm animals are partial to lucerne; pigs thrive admirably upon it. No farm should be without a well-cultivated plot of this plant. In deeply cultivated land lucerne will yield several cuttings during the season, no matter how hot and dry the weather may be. It is this drought-resisting quality which renders lucerne such a valuable fodder plant in Queensland and New South Wales, where it is extensively grown for pasture purposes.

Cost of Working a Farm in New Zealand.

When comparing the cost of working a farm in England with one of the same size in the colony, several points have to be taken into account, such as the climate, the soil, labour, and machinery. In Australasia wages are higher than in Britain; as a set-off against this, New Zealand can claim, firstly, that there are more fine working-days in the year, the fields are much larger, the latest improvements in machinery have been introduced, the soil is more easily worked, and that the genial nature of the climate renders it unnecessary to house stock during the winter months, at least in the North Island, thus saving the cost of attendance; secondly, that farming operations may be carried on continuously throughout the ploughing and sowing season; and, thirdly, that the paddocks are so large, and usually so level, that the double- and treble-furrow plough may be worked by one man or youth with three horses, thus equalising the cost of labour, as we have shown that one man, or even a boy, will be quite equal to two men or boys in the Old Country; so that, after all, the difference in the cost of working a farm in the colony is not so great as might appear at first sight.

The hay-crop is simply cut one day, raked into windrows the next, and in a couple more it is ready for stacking.

Wheat is cut and tied by machinery, the stooks requiring no capping. It is frequently threshed out of the stook in favourable seasons, thereby saving the cost of stacking and thatching; but this method, although very general, is not recommended except in hot or dry seasons. The stacks are rarely thatched, except, perhaps, on the weather side. This is a wise precaution, the neglect of which sometimes entails serious loss.

The manure bill, which is such a heavy item of annual expenditure with the British farmer, presses as yet very lightly on the farmers of the colony. It is, however, a notable fact that the use of fertilisers is becoming more general; 1 cwt. to $1\frac{1}{2}$ cwt. of superphosphates per acre is used with the turnip and other root-crops, for the purpose of forcing the young plant into the rough leaf, when it will be out of one danger—the turnip-fly. It will therefore be seen that the colonial farmer has many advantages over the farmer of the Old Country.

It may also be pointed out that the application of one or two hundredweight per acre of superphosphate of lime produces better results in colonial soils than double the quantity would do in England, showing clearly that the natural richness of colonial soils is not yet exhausted.

Live Stock.

Cattle: The total number of cattle in the colony for 1903–1904 was 1,593,547, an increase of 132,884 over the previous year.

Horses: The number of horses in the colony for 1902–1903 was 298,714, an increase of 11,295 over the previous year.

Sheep: The returns made up to the 30th April, 1903, show a falling off of 1,388,174. It must not, however, be assumed that this shortage arises from any diminution in the power of production in the colony in this direction; but rather to the continually increasing export of maiden ewe lambs, regardless of the requirements for the up-keeping of the breeding flocks of the colony. The export of frozen lambs for the year 1903, amounted to 2,212,805, and the export of frozen sheep for the same period was 2,602,612—a total of 4,815,417; besides which there were 57,431 cwt. of frozen mutton joints exported.

The returns made up to the 30th April, 1903, show the distribution of the flocks of the colony to be as follows: In the North Island, 9,433,831; and in the South Island, 9,520,722: total, 18,954,553, a decrease of 1,388,174 on the numbers for the previous year.

The estimated number of sheep in the colony on the 30th April, 1904, was 18,289,539, or a further decrease of 665,014.

Sheep.

New Zealand has proved itself admirably adapted for the breeding of all classes of sheep, from the fine-combing merino to the strongest type of Lincoln. The merino occupies and thrives on the wild lands of the colony, from the snow-line to the border of the plains, as well as on the drier portions of the plains. The merino ewe furnishes the foundation for all the crossbred varieties. On the rich moist soils the Lincoln and Romney Marsh sheep flourish, while the finer English and Border Leicesters and Downs sheep occupy the drier lands.

Sheep bred from merino ewes and longwool rams, or from crossbred ewes with Down rams, are the most suitable for the frozen-meat trade, and are known as "freezers."

The dapper little Southdown flourishes wherever crossbreds thrive. Their more ponderous cousins, the Shropshire and Hampshire Downs, have their admirers, especially the Shropshire, which are largely used for crossing, with a view to producing early-maturing lambs. English Leicesters are also much sought after for this purpose, particularly in the Middle Island, where "prime Canterbury" mutton is produced.

Shearing commences in September, and is continued till January. The usual price per hundred is from 17s. 6d. to 20s. Shearing-machines are not so largely used as was expected when first introduced.

The average clips for the various breeds of sheep are approximately: Merino, from 4 lb. to 7 lb.; quarter-breds, about 6½ lb.; half-breds, 7½ lb.; three-quarter-breds, 8½ lb.; Leicester, 10½ lb.; Lincoln, 11 lb. Of course, very much larger clips are obtained from special flocks, as much as 25 lb. to 30 lb. per sheep; but the above figures represent general averages.

The staple of New Zealand wool, especially the long-wool and cross-bred, is remarkable for its freedom from breaks and other imperfections incidental to countries subject to long droughts and scarcity of feed.

The most profitable sheep for New Zealand is that which combines the best fleece and the most suitable carcase for freezing purposes, together with early maturity. This is the class of sheep which some sheep-breeders have set themselves to produce. Whether such an animal, having fixity of type, can be evolved, remains to be proved; so much depends on the feed, situation, and soil.

The capability of New Zealand for producing mutton has not yet reached its limit. When the frozen-meat trade was first seriously considered, an assertion to the effect that the colony could soon find 1,000,000 sheep per annum for freezing without impairing the breeding-flocks was treated as highly chimerical by sheep-breeders of long experience. The annual output of sheep and lambs is now over four millions and a half. But, while congratulating the colony on the rapid development of the frozen-meat trade, it must be borne in mind that Argentina and Australia also share the trade of Great Britain with New Zealand. It must be admitted that with cheaper land, and a closer proximity to the markets of the world, Argentina must necessarily be a very formidable rival to Australasia. The only way to keep command of the market is to ship nothing but first quality graded mutton and lamb.

"The New Zealand Flock-book," published in 1895, is now thoroughly established, and is of great value to the owners of pure pedigree flocks. The Royal Agricultural Society of Victoria also publishes a Flock-book for British breeds of sheep. This is a step in the right direction, as flock-masters in South America demand a certificate to the effect that the cattle and sheep purchased by them are duly registered in an authorised Herd- or Flock-book. The value of these books is now so fully recognised that all the distinctive breeds of sheep in Britain and elsewhere have their recognised registers.

Horse-breeding.

The climate of New Zealand is admirably adapted for the breeding and rearing of horses of all kinds, especially draught-horses. Indeed it would be difficult to find better Clydesdale horses than

those bred on the limestone soils of Oamaru and elsewhere. Some of the best blue-blood of this breed has from time to time been imported from Scotland, with the result that the breed is now well established in the colony.

The light-horse stock of the colony has risen into note through the production of animals which have rendered themselves famous on the colonial turf. The demand for horses suitable for remounts for the cavalry service in India is a continuous one, affording a ready market for the proper stamp of animal; shipments are periodically made to that country with varying results.

With a view to bringing the use of pure-bred sires within the reach of small selectors in the outlying blocks the Government have imported a few first-class horses of the most approved types, which cannot fail to have a beneficial effect on the stock of the country. The Canterbury Agricultural and Pastoral Association publish a Draught-horse Stud-book, which is largely used by breeders of that class of horse.

Cattle.

The colony possesses all the best strains of blood, and this is evidenced by the superior class of cattle to be met with throughout the settled districts, especially in the show yards. There are now four herd-books published in the colony—viz., the "Shorthorn," "Other Breeds," published by the Canterbury Agricultural and Pastoral Association, the "Hereford Herd-book," published by the Hereford breeders, and the "Jersey Herd-book," published in Palmerston North. The value of properly kept herd-books is now fully recognised. Purchasers of animals for export or otherwise now demand that they shall be duly registered in some authorised herd-book as a guarantee of pure breed. New Zealand is comparatively free from many of the diseases so disastrous to horned stock in other countries. With a view to maintaining this enviable position, the Government have prohibited vessels carrying live-stock from infected colonies touching at any of the ports of New Zealand except under certain conditions. This action is deemed necessary, owing to the prevalence of pleuro-pneumonia in Australia.

Dairy Stock.

The breeding of first-class dairy stock offers a field for profitable investment. Milking-cattle now command a high price, and will continue to do so, owing to the increasing development of the dairy industry. There are now 468,125 cows kept exclusively for dairy purposes, an increase of 39,352. The rearing of well-bred heifer calves will repay all the time and trouble bestowed thereon. Separated milk, although relieved of its butter-fat, loses little of its feeding value; the addition of a little linseed meal will restore the fatty constituents, which, however, are not the most valuable for feeding purposes. Ground oats, wheat, or barley added to the linseed mucilage will render calves fit for the butcher in a comparatively

short time. An acre or so of European flax should be grown upon every farm where stock-rearing is carried on. The fattening of calves for export has not yet been attempted in the colony, although there is a very large and lucrative market for veal calves in London, ranging from £4 to £6 and £7 per head. Much has still to be done in the way of improving the dairy stock of the colony. The yield of milk from fairly good milking-cattle is approximately 500 gal. per annum, although 700 gal. per head are frequently obtained from selected herds. The average quantity of milk obtained will no doubt be increased as more attention is paid to breeding and proper feeding. The general management and feeding of dairy stock is a question demanding every attention. Kind treatment is essential to success; clean pastures, clear running water, and grasses of the best quality are all factors fully recognised wherever dairying is successfully carried out; and, last but not least, warmth and shelter during the cold wet months of winter.

The average yield of butter from milk passed through the separator is 1 lb. for every $2\frac{1}{2}$ gal. of milk of $10\frac{1}{2}$ lb.; so that the average cow produces annually 200 lb. of butter, or 500 lb. of cheese, which, estimated at $4\frac{1}{2}$d. per pound, will be worth about as much as the butter.

The Dairy Industry.

This industry continues to flourish throughout New Zealand. The Government still spends large sums of money in teaching the art of butter-making, the proper method of packing, and shipping. Till recently nothing was done in the way of encouraging the breeding of better strains of cattle for the production of milk of superior quality as well as quantity. The Government, recognising the importance of this matter, have imported a few first-class sires from well-known breeders of milking strains of cattle for the use of those dairy farmers who are not in a position to secure the best bulls for their purpose. The service of these bulls has been fixed at a nominal scale, and is only available for selected animals. It will thus be seen that dairy farming has now developed into one of the settled industries of the colony. Graders are employed examining all butter and cheese for export, who brand each packet with its proper quality. Factory-owners now recognise the fact that it is folly to pay freight on any but the best quality; and this remark applies to grain and meat as well. We have to compete against Canada, the United States, Denmark, Australia, the Argentine, and Siberia. New Zealand dairymen must, therefore, endeavour to raise dairy cattle which will yield the maximum of milk of the best quality; in fact, nothing but intense farming will pay in the future, applied to every branch.

The complete sterilising of milk to destroy the germs of disease is a wise precaution. The operation consists of heating milk up to a certain temperature, and cooling it rapidly, a process which has been found to destroy the bacillus of tuberculosis known to be

present in the milk of affected cattle. The Government veterinaries are employed examining the cattle, and a large number are annually tested with tuberculin, and when found affected they are destroyed, compensation being allowed.

Pigs.

These useful adjuncts to the dairy should hold an important position on all dairy farms in New Zealand. The last statistics show that there has been a material increase in this class, swine numbering 226,591, an increase of 32,851 as compared with 1902–1903. The favourite breed in New Zealand is the improved Berkshire. The large and small breeds of White Yorkshire are also to be met with, but are not so generally approved of as the black pigs. The Tamworth pig has its admirers amongst pig-breeders, as they answer admirably for crossing with black pigs. They produce good bacon pigs, making more lean meat and longer sides than the pure Berkshires. Pigs require no better attention than a good grass paddock, with a liberal supply of roots, and a little unthreshed pea-haulm for a few weeks before killing, with plenty of water, and shelter from the sun during the warmest summer months.

The breeding, rearing, and fattening of pigs is a source of wealth which is capable of considerable expansion. Several plants for the mild curing of bacon have been set up at the various freezing-factories, and by private persons and firms. The establishment of properly appointed pig-farms is a somewhat costly undertaking, as all the fences must be pig-proof. Doubtless this consideration has had a deterrent effect upon some, while others find the rearing of young stock for the dairy and the breeding of lambs a sufficiently profitable undertaking, besides causing less trouble, but there is room for an enormous extension of this industry.

Poultry.

The efforts being made by the Government to foster this industry are gradually producing the hoped-for results. The distribution of a better class of poultry is showing good results already. Farmers are beginning to see that their poultry-yard should form no mean auxiliary to the general return from the products of the farm. With such a climate as we have, there need be no difficulty in raising hundreds where dozens are now produced. The Department is doing much to foster this industry, with what success may be gathered from the following statement of facts: Since the 1st January last (1904) no less than 100,000 head of poultry have been prepared for export in Christchurch. The Government Poultry Depot is kept busily employed. The Agricultural Department intends to seek legislation to prevent the export of any poultry unless it has been graded by a Government official. This is a step in the right direction.

The Fruit Industry.

From the North Cape to the Bluff Hill, in the extreme south of the Middle Island, the climate and soil are, for the most part, eminently adapted for the growth of a large variety of fruits. Generally speaking, pears, plums, quinces, apricots, figs, walnuts, cherries, gooseberries, currants, strawberries, and raspberries grow luxuriantly, producing abundant crops of fruit. In the Auckland District, oranges, lemons, and limes flourish: many groves are now bearing, and afford light and pleasant employment to a large number of persons. This employment will go on increasing as the plantations throughout the colony become older. The olive flourishes in the North Island, bearing heavy crops, and the manufacture of oil will assume important dimensions at no distant date.

Vine-growing is also carried on with tolerable success in many districts; tons of fruit grown under glass are sold in the Auckland markets annually. Signor Bragato, an Italian wine expert, has given it as his opinion that there are numerous localities in both Islands suited for growing vines for the manufacture of wine.

Away in the far north the banana grows and ripens its fruit, but it is not thought that it will ever enter into successful competition with those grown and imported at so cheap a rate from the Pacific Islands.

Extensive orchards of apples have existed in Auckland for many years, and are still capable of producing an abundance of fruit, if kept free from codlin-moth and other pests. Orchard-planting is progressing, and must one day be a very important industry. Central Otago will also become a large fruit-producing district, being free from violent and scorching north-west winds. The total area under orchards in the colony is 27,541 acres, including 749 acres of vineyard.

The manufacture of cider has assumed considerable dimensions, opening up a ready market for suitable surplus fruit. The colonial-made article is rapidly coming into favour with the general public.

The drying of fruit has been fostered by the authorities, who sent an expert through some of the apple-growing districts, giving practical lessons in the art of artificial fruit-drying. A great deal more might also be done in bottling fruits, and the manufacture of fruit-wine, if only for home consumption. The manufacture of jam is successfully carried on; there is, however, plenty of room for further developments in this direction.

Prospects of Small Farmers.

Those who have watched the course of events in other countries, so far as they affect the agricultural interests of New Zealand, are forced to the conclusion that New Zealand will have to pay great attention to the quality of her agricultural exports. Our farmers cannot hope to compete with such countries as Australia and South America, where land is so much cheaper, and where mutton

and beef of good quality can be produced; for cheap meat these must command the markets of the world. Happily for New Zealand, our climate and pastures are such that we can not only produce mutton equal to the finest English or Scotch, but we can produce more per acre than can be done in Australia. Our dairy-produce is now second to none, which is largely due to the system of manufacture and Government grading.

Owing to her humid climate and fertile soil New Zealand is peculiarly well adapted for small holdings. Men of slender means can easily make homes for themselves and their families, always provided they know something of the work they undertake, and are, with their families, willing to work hard and live frugally for a few years. It is quite possible for a man with a few cows and pigs, together with poultry and bees, to make a good living, as markets for these products are available in England and elsewhere; there is also a good local market if the goods are properly prepared, and a continuous demand for the supply of coastal and ocean-going steamers. The facilities now given for obtaining land and money at reasonable rates offer great inducements to persons to settle upon the land. This is amply illustrated at Cheviot, where a fine estate has been cut up into moderate-sized farms, and let to farmers on perpetual lease at a rental representing 4 per cent. on the purchase-money. Prosperous homes have sprung up, and tree-planting is being carried on by some of the settlers, which is an earnest of the stability of the settlement.

Arbor Day.

Speaking recently on the subject of tree-planting, at a meeting of farmers, Mr. T. W. Adams, of Greendale, made the following statement:—

"Arbor Day is languishing, if not dead, and mainly, I think, for the want of suitable sites for planting. As a rule, the school-sites are too small to allow of anything but a few shelter-trees round the boundary, and, however desirous the Committee or teacher of a school may be to observe the day, they are often unable to do anything in the way of planting on Arbor Day. It has occurred to me that if the Road Boards or County Councils would prepare annually a reserve in a convenient position for one or more schools it would help along the object famously. In many cases a reserve could be found that would be so situated that three or four schools might meet at the same place, and if each school were allotted a portion it would cause emulation between them, which would encourage them to do their best to make the planting a success.

"It seems a great pity that the day should be allowed to drop, as it would give an opportunity for the study of nature not to be found in the schoolroom; and although the winter is not so favourable as the other seasons for the study of botany, yet much might be done even in winter to awaken in boys and girls their powers of observation. Supposing pines are being planted, the children could be shown the difference there is in the number of needles in a sheath, say, between a *Pinus insignis* and a Scotch pine, or between the Weymouth and the Bishop's pine, the length of the needles, the shape of the buds, and many other points which the close observer notices in the trees. Even deciduous trees, which are leafless in winter, have characteristics that the person who has made them a study detects at a glance—something in bud, or bark, or twig, which is generally sufficient for him to recognise even trees of the same species in winter.

"Why the advantages to be derived from tree-planting should require any advocacy, in view of the marvellous effects which have resulted from the establishment of Arbor Day in the United States of America, is difficult to understand. Tree-planting is being carried on by the General Government, Road Boards, County Councils, and by private individuals throughout New Zealand; this work, however, should be carried out on a much larger scale than at present, especially by the public generally. One of the best means of cultivating a desire for tree-planting in the minds of the people, more especially those of the young, would be by fostering a general observance of Arbor Day throughout the colony."

EXOTIC TREES IN CANTERBURY: THEIR GROWTH ON THE PLAINS.

[By Mr. T. W. Adams.]

Effect of Extremes of Climate.

The following paper was contributed by Mr. T. W. Adams, of Greendale, at the Science Congress, Dunedin:—

Having during the last thirty-five years planted many species of trees and shrubs, an opportunity has been afforded me of testing their suitability to withstand the extremes of the winter cold and the heat and drought of summer characteristic of the Canterbury Plains. Greendale, where most of the planting has been done, is situated in the forks of the Selwyn River, is about 400 ft. above sea-level, and about ten miles from the western foothills. The average rainfall is about 26 in. per annum, but during the years 1897 and 1898 not more than half that quantity per annum was registered. In Canterbury there is no marked difference as to rainfall in any part of the year, but rain may fall in any month. In the dry year of 1897 February was the wettest month, with less than 3 in. for the month. In the next year, which was also very dry, the most rain fell in the month of May—about 3½ in. On the Canterbury Plains the summers are very hot, the thermometer in the shade sometimes registering nearly 100° Fahr. On the other hand, the winters are occasionally very severe, 24° of frost having been registered on more than one occasion. Such extremes limit considerably the number of species of trees that can be successfully grown; but as the country is everywhere intersected with water-races, it is possible to grow to a limited extent many trees that would not otherwise live through the seasons of drought. But for trees that will not bear the winter frosts there is no remedy. Speaking generally, Western American trees have succeeded best, although there are trees from many other parts of the world that are equally successful. Australian trees are generally capable of bearing the dry summers pretty well, but the number that are capable of withstanding our winters is very limited indeed. Trees from Japan seem quite incapable, unless assisted by an artificial water-supply, of living through our dry summers, but they withstand our winters admirably. As a rule, one would expect that trees growing in any country of about the same latitude as any particular part of New Zealand would likely succeed in that part of New Zealand. But in practice one finds many exceptions; altitude, soil, and amount of rainfall all have to be taken into account before any satisfactory conclusions can be drawn as to the probability of success or failure of certain trees; and even after this many puzzling exceptions will be met with, some trees growing quite readily in a much lower latitude than their native habitat. The kauri (*Dammara australis*) is a notable illustration of this, being only found growing in the north of New Zealand, yet I believe it can be grown successfully as far south as Dunedin. Of exotic trees we have a notable example in the Brazilian monkey-puzzle (*Araucaria braziliensis*). This tree, though a native of the country north of Rio de Janeiro and within the tropics, has proved hardy in Canterbury, and grows much faster than the Chilian monkey-puzzle (*Araucaria imbricata*). On the other hand, a good deal of disappointment has been met

with through planting trees grown in northern Europe, such as the larch (*Larix europœa*), spruce (*Abies excelsa*), and Scotch pine (*Pinus sylvestris*). Judging from English text-books, these ought to have been just the trees for our thin soil. As one of the best authorities says of the Scotch pine, "No tree can be reckoned upon with so much certainty to succeed in poor soils of diverse quality and texture, ranging from loose sand to stony formations." Also of the larch he says, "An alluvial gravelly soil is what the larch requires. Here on the Canterbury Plains we have the exact soil that these trees are said to require, and yet they have proved sad failures except in a few favoured positions."

As the Canterbury Plain when first settled was almost destitute of trees, and at the same time subject in summer to very violent gales from the north-west of a very hot and parching character, and in winter to frequent heavy snowstorms with strong winds from the south, the first settlers naturally began to inquire for suitable trees for shelter. From their home experience they planted many thousands of larch, Scotch pine, and Norway spruce, and these at first throve so well that they were raised in large numbers by the nurserymen. But after a few years' experience they were found quite unsuited for the drier atmosphere of the Canterbury Plain. The same may be said of nearly the whole of the species of trees introduced from Japan. Other trees that failed badly in our years of drought besides those already mentioned were the following: *Wellingtonia gigantea* (I am following the English nomenclature all through the paper), *Sequoia sempervirens*, *Abies alba*, *Abies nigra*, *Thuja gigantea*, *Abies Menziesii*, *Abies canadensis*, *Cupressus lawsoniana*, and in a less degree *Abies douglassii*. Of the trees that came through with the least injury, that close relation of the Scotch pine, the Austrian pine (*Pinus austriaca*), was very noticeable, the deep green of its leaves being in strong contrast to the foliage of the Scotch pine. Other pines that proved capable of withstanding the dry seasons were— *Pinus ponderosa*, *Pinus coulterii*, *Pinus jeffreyii*, *Pinus laricio*, *Pinus rigida*, *Pinus fremontiana*, *Pinus benthamiana*, *Pinus tuberculata*, *Pinus muricata*, *and Pinus insignis*. Professor Lemon, speaking of *Pinus insignis* and *Pinus muricata* in a letter to me, expresses surprise that they should stand drought, as they are, he says, both lovers of the moist coasts. In the droughts of 1886 and 1897 and 1898 a few trees of each of these perished when in an unfavourable position, but on the whole they stood the test very well, although not as well as the Austrian pine, *P. coulterii*, *P. sabiniana*, and one or two others. Of the cypresses several species were not much injured by the drought. *Cupressus nutkaensis* seems capable of bearing a long drought better than many others. Of the deciduous trees, few, if any, stood the test better than the English oak, although in the long drought of 1897 and 1898 they lost all their leaves, and in some cases died back to the extent of two or three years' growth. On the return of better seasons they quickly recovered. In the shorter but more intense drought of 1886 the oaks passed through with little damage, whilst the spruces and larch were killed by thousands, but in the longer drought the oaks suffered equally with the spruces.

The various willows were an interesting study during the dry seasons, showing that there exists a wide difference between the various species as to their power of doing without water. The broad-leaved or sallow willows last out much longer than the others; the most sensitive being the Huntingdon willow (*Salix alba*), which soon died after it lost the support of water. The upright poplar is very drought-resistant, and the grey poplar (*Populus canescans*) stood it well; but the Canadian poplar (*Populus balsamifera*) was soon killed. Of the maples *Acer campestre* went through very successfully, and *Acer negundo* was not much damaged, but most of the others in a large collection suffered severely. The English ash (*Fraximus excelsior*) is quite a failure except on the better lands of the plains. The most promising of the family are *Fraximus oregana* and *Fraximus vividis*. The species of elms are generally much more at home than the species of ash, and not much difference was observed between the trees of any one species of elms. *Catalpa speciosa*, of which so much has been written, is of no value whatever on the Canterbury Plains. Of walnuts, the black walnut (*Juglans nigra*) gives the most promise of success. They all escaped damage from frost except the Californian walnut, which had all its last year's

growth killed. The eucalypts, as was to be expected, passed through the dry seasons better than most of the other families of trees, although some trees of *E. amygdalina*, in unfavourable positions, were killed, and trees of *E. coriacea* became almost leafless. The winter frosts are the chief hindrances to the successful growing of the various gum-trees in Canterbury, and out of a large number of species tried the only ones to live through a succession of our winters are *E. coriacea*, *E. urnigera*, *E. gunnii*, *E. stuartiana*, *E. regnans*, *E. amygdalina*, *E. mulleriana*, and *E. globulus*. In the exceptionally cold winter of 1899 trees of the blue-gum (*E. globulus*) 70 ft. high, and nearly 3 ft. in diameter, were killed. These had been growing for more than thirty years. In the same season wattle-trees of equal age of the species *Acacia dealbata* were killed. Younger trees of *A. melanoxylon* were also killed. No other species of wattles have stood the frosts of more than two or three winters, although many species have been tried. Of the thirty or forty species of oaks planted here none were much damaged by the frost. Two of the Californian evergreen oaks (*Quercus dumosa* and *Q. agrifolia*) only had their leaves browned, but were not otherwise hurt. The beautiful evergreen species from Japan, *Quercus acuta*, *Q. cuspidata*, *Q. glauca*, *Q. laevigata*, *Q. Phyllioides*, came through unhurt. The cypresses all proved hardy enough to stand the winter except the Guatemala cypress (*C. excelsa*), which was a little damaged. As showing the severity of the winter of 1899, I may mention that the native trees, almost without exception, were greatly damaged. Such things as manuka (*Leptospermum scoparium*), cabbage-tree (*Cordyline australis*), and other plants indigenous to the plains, were killed in great numbers.

So far I have dealt mainly with the effects of the two extremes of our climate on the various species of trees and shrubs. But in other cases causes have been at work to change the habits of a tree from its behaviour in its natural state—changes that are not so easily explained. Writing to a gentleman in California of the way *Pinus tuberculata* and *P. murrayana* grew here, he was so surprised that he hinted he thought I should have to change my labels; but on sending him specimens, he admitted that my trees were correctly named. Here *Pinus tuberculata* and *P. murrayana* both grow rapidly, and make good shelter-trees, with a wide spread of branches, on which it is not unusual to find still unopened cones for each year for twenty-five years. Although I have hundreds of trees of *Pinus tuberculata* with cones on them from twenty to thirty years, I do not remember to have seen one opened by the sun. Another remarkable thing about the cones of *Pinus tuberculata* is that, being pointed at the base, it is not an uncommon thing for the cones to become quite embedded in the tree, and it is said that such cones, when taken out of the tree and opened, have given up seeds that have still retained their vitality. I cannot vouch for this, but cones fifteen years old, and remaining on the tree unopened, contain fertile seeds, as I have proved. These trees, I am told, as found in their natural state, are growing in thick clumps of small poles without any side branches, and as unlike their habit here as possible. The reason for this remarkable change of habit may be found, I think, by considering the fact that these trees never release their seeds till a fire passes through them. The cones then open, liberating thousands of seeds, which fall on a prepared soil and spring up like grass, each one struggling for existence. The seedlings pressing upwards to the light are thus drawn up into thin poles without any side branches.

Obviously the planting of exotic trees must be of an experimental character, and only those who have been engaged in the work of introducing new plants can appreciate the difficulties met with; but if we all give to the world our experience, and exchange notes now and then, there would soon accumulate sufficient knowledge to enable us to work on a systematic plan, and avoid the frequent errors of the present rule-of-thumb methods.

SECTION III.

ROTORUA.

[By A. S. Wohlmann, M.D., Government Balneologist.]*

There is no district in the world containing a larger quantity and a greater variety of hot mineral springs than Rotorua. Their total number is enormous and practically impossible to estimate, for while the number of the large springs must run into hundreds, in some areas small ones bubble up from under the lee of every little rock and wash the roots of every tuft of hardy manuka, until the ground is literally a sieve, where one must walk warily, and where to stray from the beaten track after dark is to court disaster. Such areas as the Kuirau Reserve, the lake-shore from the Sanatorium grounds to beyond the Postmaster Baths, and parts of Whakarewarewa and Ohinemutu are simply riddled, and to form a fresh spring all that is required is a few moments' work with a spade. Stories have got about, which have obtained a wide credence, that the ground is in a constant tremble, that the air always reeks of sulphur, that the place is a veritable Gehenna, to be gazed at and sniffed at with awe—and swiftly departed from. These are "travellers' tales." There are whiffs of sulphur in the air certainly, especially on damp days, but the ground does not tremble, and though earthquakes are not uncommon they are less severe than in other parts of the country. The average visitor, unless he is stopping to take a course of the baths, is whisked off every day by enterprising caterers to see the wonders of the distant districts, ignorant of those that lie at his very door. At Ohinemutu, at Whakarewarewa, even in the Sanatorium grounds, may be seen as fine examples of thermal activity as could be wished, while the Sanatorium gardens afford an endless feast of floral colouring. Here one may take one's tea *al fresco*, sitting at daintily-spread tables, and attended by Maori maidens in picturesque native dress, while a band discourses music, or if more energetically inclined may repair to the beautiful bowling-green, the tennis or the croquet lawn. Or here the lazy man or the contemplative may sit on a shady seat and smoke his pipe at ease, watching the shadows purple the woods of ever-beautiful Mokoia lying like a jewel on the breast of Rotorua.

The Township of Rotorua has been well laid out. Broad straight streets, planted with avenues of English trees, intersect

* I must express my great indebtedness to Sir James Hector and to Professor Maclaurin for the numerous analyses they have placed at my disposal.

each other at right angles, lined with little villas each surrounded by its own garden, giving plenty of light and air and space, while the public gardens will more than bear comparison with the finest in the country. Besides the usual public buildings there is an excellent public library, while the town boasts, in addition to easy access by rail, such conveniences of up-to-date civilisation as electric light and a telephone exchange.

To add to its value as a health resort, Rotorua possesses a bright, sunny, bracing climate. Standing as it does, on an inland plateau, at an altitude of nearly 1,000 ft., by a wide expanse of lake, there is nearly always a keen air, and visitors will do well to bring with them warm clothing, and not be misled by such a geographical expression as latitude.

Turning our backs on the lake and following the broad main street of Rotorua for a couple of miles, we come to Whakarewarewa, perhaps the most interesting spot in the whole thermal district. The ground seems fairly alive with every kind of hot spring and hot mud-pools of every size, shape, and colour. The beautifully shaped cones of the mud geysers are especially interesting, as here you may see in the actual process of formation perfect models of the craters of the great volcanoes. Here, too, may be seen several very fine geysers. The action of the largest of these is intermittent. At Whakarewarewa the amount of hot mineral water is simply enormous, millions of gallons bubbling and hissing and seething all around. Finally, here is a Native village of surpassing interest. Women, in crimson and green and purple, puffing stolidly at the inevitable pipe, the inevitable baby slung across their backs; piccaninnies of all shapes and sizes and colours, active bright little beggars, here, there, and everywhere, dodging between the legs of the pakeha, diving from the high bridge for the coins he may throw, shrilly clamorous to dance a haka for him, to sing to him,—anything, alas, to extract the tourist's cash. There are several primitive but very enjoyable baths at Whakarewarewa, notably the Spout Bath, which is practically a hot waterfall, part of the overflow of an enormous spring, and the Oil Bath, somewhat resembling the Rachel.

At Ohinemutu, the old township of Rotorua, one may see, with the exception of the geysers, pretty much the same sights as at Whakarewarewa, but everything is, so to speak, on a softer scale. The Native village seems a thought more civilized; the boiling springs are curbed to a decorous bubble, even the sullen black mud geysers look less blatantly diabolical. Here as at Whakarewarewa one may see the Natives cooking by natural steam over a banked-up spring, and may also, for a consideration, throb to the fierce stamping of a haka in the carved meeting-house, or be lulled by the rhythmic grace of the poi dance.

As a contrast to so much hot water, a trip across the lake to Hamurana is well worth doing. A river of purest water wells up with great force through a shaft of rock—whose iridescent walls

sparkle and scintillate with colour—and runs a short swift course to the lake. The picture of hanging willows and blue waters mantled with red water-weed is one to haunt the memory. But you must go on a fine day.

From Hamurana the steamer proceeds to Mokoia, an island stored with Maori legend, and on to Te Ngae, where the coach takes one to Tikitere and Rotorua.

At Tikitere are the same thermal phenomena as at Rotorua, but the hot mud springs are in a state of even fiercer activity. A short walk along a pretty bush track takes one to the Blue Lake, a sheet of fresh water nestling calmly beautiful in the hollow of a crater of verdure-clad hills.

No one should leave this district without visiting the great fresh-water lakes, Rotoiti, Rotoehu, and Rotoma. Rotoiti can be reached either by road or by water, and is worth going a long way to see. The road, after leaving Tikitere, skirts the lake for miles, here giving a panoramic view of the blue waters, there running round a miniature bay where tiny waves lap a white sandy beach and promontories of rock and forest are mirrored in the calm waters they shelter. Should time permit, passing Rotoehu and along Hongi's Track through the forest, a luxurious bath may be taken in the hot effervescing springs of Waitangi, and a glimpse obtained of Rotoma, perhaps the loveliest of all the lakes. Or, going by steamer, one reaches Rotoiti by the Ohau Channel from Rotorua, and, winding along the other shore of the lake, pries into a succession of exquisite nooks, rich with the luxuriant beauty of native bush down to the water's edge. Leaving the steamer at the far end of Rotoiti, the journey may be continued home by coach *viâ* Tikitere.

Perhaps the most interesting, and certainly the most enthralling excursion of the whole district is that known as the "round trip." This takes one round the scene of the Tarawera eruption of 1886, past the buried village of Wairoa, and past the mighty geyser of Waimangu. Part of the trip is by road and part by water, the interest increasing with every step of the journey till it culminates in Waimangu itself.

Leaving Rotorua by coach, proceeding across the pumice plain, and passing through a narrow belt of bush left undestroyed by the eruption, one suddenly comes on Lake Tikitapu, of an almost unnatural blue, and beyond it Rotokakihi, of an equally fantastic greenish shade. The curious colour of these lakes is due to the suspended mineral matter in the water. Passing these lakes, Wairoa is reached, the village buried by the eruption of Tarawera in 1886. Ruins of the old mill, the hotel, Sophia's whare, and here and there parts of the walls of a cottage still remain ; but Nature is busily and successfully engaged in covering up the pathetic relics of the past. From Wairoa a pleasant row or sail across Lake Tarawera lands one at the foot of the volcano, in a wilderness of dried mud, furrowed to an extraordinary degree with storm-water. A short walk, and we

embark again on Lake Rotomahana, and row past the sites of the Pink and White Terraces, the former still in a state of fierce thermal activity. Boiling springs and steam-holes riddle the hillside, while numerous hot springs rise from the floor of the lake, so that one may enjoy the somewhat uncanny experience of rowing over boiling water and feeling the boat vibrate as to the propeller of a steamer. Disembarking where a deep gorge marks the cleft of the eruption, we follow the course of the overflow water of Waimangu up a fairly stiff incline, till we reach the shelter hut overlooking the geyser, usually hot and panting and more than ready for lunch. Hundreds of feet below us lies a small lake, rather over an acre in extent, looking absolutely quiet and innocent. That this apparently harmless sheet of water may suddenly shoot a thousand feet into the air, bearing with it tons of mud and boulders, seems quite incredible, and it requires all the photographs of the guides to convince the doubters who are disappointed in a display, that Waimangu is really a geyser at all. Beside the actual geyser is a boiling lake, the Echo Crater Lake, which looks much more formidable and geyser-like. Though there is a rough periodicity about Waimangu of about thirty hours, yet this is by no means absolute, and however carefully one may plan a visit it is impossible to insure seeing a display. To get over the difficulty, the Government have just erected a handsome "accommodation house," which is really an hotel, commanding a fine view of the geyser and a panorama of Tarawera mountain and the district for miles around.

The Mineral Waters of Rotorua.

Before proceeding to a description of the mineral waters and baths of Rotorua, it may not be out of place to preface the account with a few words on the action of mineral waters generally. There is a largely prevalent idea that the mineral matters dissolved in thermal waters are absorbed through the skin of the bather, enter into his system, and so directly attack the disease. Unfortunately —or perhaps fortunately, for the results in every-day life would be disastrous—this is by no means the case. The skin, partly from the greasy secretions on its surface and partly from the nature of its construction, is quite incapable of absorbing substances in watery solution, except under special conditions. Substances dissolved in a fatty medium may undoubtedly penetrate the skin, and so may certain gases, such as sulphuretted hydrogen, which is abundantly present in the waters, or very finely powdered substances such as the sulphur which is deposited on the skin after a sulphur-vapour bath. Probably, too, a certain amount of mineral water is absorbed when directed on to the skin in fine spray under pressure, more especially if massage is used at the same time, as in the Aix massage douche. A very much larger amount may be absorbed through the lungs and respiratory tract by inhaling the vapours and fumes arising from the waters, and this will explain why it is that silver articles

about the clothing may be blackened by the sulphur exuded through the skin several days after leaving a sulphur district. But when all is said and done, the amount absorbed by the skin and lungs is so infinitesimal that it plays quite a minor part in the therapeutics of thermal bathing, and it is only when taken by the mouth in carefully graduated doses that the medicinal effect of the dissolved salts can be obtained. It is to the mechanical, chemical, and possibly electrical, stimulation of the skin by the thermal waters that the balneologist trusts for all those curative processes which it is his function to direct, aiding them with massage, passive movements, gymnastics, or electricity, as the case demands.

The skin must be conceived as a structure exceedingly rich in blood-vessels, which, though minute in themselves, are, when taken in the aggregate, capable of containing a large proportion of the whole blood-supply of the body. Remembering, too, that these vessels are capable both of great dilatation and active contraction, and that they can readily be made to dilate or contract by using various mineral waters and varying the temperature of the water, it will at once be seen how profoundly a properly selected mineral bath may modify the circulation, can be made to draw blood to the surface, relieving an inward congestion, or by constricting the skin may flush the deep vessels. It can readily be seen, too, how this action of the skin, which has been termed the "skin heart," may greatly help on the action of a heart perhaps diseased and overloaded, or, again, by injudicious use may thwart that organ and cause fainting or even death. For this reason alone it is about as reasonable a thing to take baths "on one's own" for the cure of disease as to go into a chemist's shop and reach down the nearest bottle "on spec."

The nature of the mineral waters of Rotorua and their source are described below, and full analyses of the principal springs given:—

Nature of the Waters.

While amongst the countless springs arising in the Rotorua district there are, as might be expected, considerable numbers of varieties, and although it is no uncommon thing to observe two springs of almost diametrically opposite chemical properties arising side by side, yet there are certain features common to all.

In the first place, all the mineral springs in the district are hot, and where at times there may appear to be exceptions to the rule it will always be found that the coolness of the water is due either to admixture with fresh water or to evaporation in a basin comparatively large and fed only by a small spring. Without exception, too, the waters contain in solution either sulphuretted hydrogen, sulphurous acid, or both gases. Another invariable ingredient is silica, either in the form of silica, silicic acid, or a combination of that acid with various bases. This is a special characteristic of the waters of geyser regions, and is noticeable in Iceland and in the Yellowstone Park, U.S.A. To this silica is due the formation of those wonderful terraces for which New Zealand has long been famous. The hot water, as it cools and concentrates, being no longer able to keep in solution its dissolved salts, these are deposited in layers, either horizontal and delicately rippled or in stalactite masses, the colour varying generally from white through every shade of grey to pink, according to the nature of the metals present with the silica. This deposition is materially assisted by the action of

living algæ. The waters, which may therefore be classed under the heading of sulphurous siliceous thermal waters, may be roughly divided into two main groups—acid and alkaline—with various subdivisions, and it is to the close juxtaposition of these entirely unlike waters that Rotorua owes its unique importance.

GROUP I.—THE ACID SULPHUROUS WATERS.

The distinguishing characteristic of these waters is the presence of free hydrochloric acid, free sulphuric acid, or both, in considerable quantity. In addition, they contain a large amount of alum, sulphate of soda, and iron-oxides, and in the somewhat cumbersome nomenclature of certain modern authors would be classed as acid sulphuretted sulphated alumino-chalybeate siliceous waters, a type which does not exist in Europe, though found in the Yellowstone Park, U.S.A., in Tuscarora, Canada, and in Japan.

Such waters are more suitable for external than for internal use, and for baths of what are known as the "simple immersion" kind they are especially valuable.

In addition to the therapeutic action which they exert in common with all other thermal baths, these waters possess a very powerful rubefacient action in virtue of the free acids they contain. By rapidly withdrawing large quantities of blood to the skin over the whole surface of the body, they profoundly modify the circulation, relieving congestion of internal organs and inflamed joints and nerves, easing pain and stiffness, resolving exudations, and promoting glandular activity. They act, in fact, in medical parlance, as powerful alteratives.

Besides their use as baths, some of these waters, more especially those containing a large proportion of alum and sulphurous acid, have been used with great success as astringents and antiseptics, as gargles in cases of relaxed and congested throat. The Egg-pot, a small but powerful spring near the Postmaster Baths, has long had a reputation for this purpose.

The best-known examples of the acid waters are the springs supplying the Priest and Postmaster Baths.

Class 1.—The "Priest" Water.

This spring percolates through a layer of hot pumice a few feet beneath the surface of the ground, and flows into the lake. The water has a greenish tinge, a very acid taste, an odour of sulphuretted-hydrogen and sulphurous-acid gases, and issues from the earth at a temperature of from 98° to 110° Fahr. The total output it is impossible to estimate, on account of the numerous sources of leakage, but it is very large. The analysis is as follows:—

	Grains per Gallon.
Sulphate of soda	19·24
„ potash	Traces.
„ lime	7·41
„ magnesia	3·03
„ alumina	21·67
„ iron	1·24
Sulphuric acid	22·12
Hydrochloric acid	3·65
Silica	18·41
Total	96·77

Also sulphuretted hydrogen and carbonic-acid gas.*

The Postmaster.—This spring bears a very close resemblance to the Priest, both in its situation and in its chemical properties, and differs only in containing an even larger proportion of free sulphuric and hydrochloric acids. It may, in fact, be looked upon as a stronger Priest water. It issues from the ground at a temperature varying from 98° Fahr. to 110° Fahr., and the total outflow is about the same as, or rather less than, the Priest spring. The following is the analysis of the water:—

* In this and subsequent analyses the exact amount of gas present is not stated, except in cases in which the analysis was made on the spot.

	Grains per Gallon.
Sulphate of soda	32·87
" potash	1·24
" lime	4·93
" magnesia	1·83
" alumina	33·22
Iron-oxides	4·42
Sulphuric acid (free)	30·32
Hydrochloric acid (free)	6·14
Silica	17·61
Total	132·58
Sulphuretted hydrogen	*

Two springs near the Postmaster, and at present supplying some unenclosed and almost disused baths, are the Waikupapapa and Ngaruapuia. The waters, as will be seen from the analysis, are practically identical with the Priest water, but considerably weaker.

Waikupapapa.

	Grains per Gallon.
Sulphate of soda	33·18
" potash	0·26
" lime	2·44
" magnesia	0·24
" alumina	0·32
Iron-oxides	Trace.
Sulphuric acid (free)	4·29
Hydrochloric acid (free)	7·49
Silica	8·23
Total	56·45
Sulphuretted hydrogen	*

Ngaruapuia.

	Grains per Gallon.
Sulphate of soda	29·80
" potash	0·64
" lime	6·87
" magnesia	0·31
" alumina	..
Iron-oxides	Trace.
Sulphuric acid (free)	3·11
Hydrochloric acid (free)	6·76
Silica	12·01
Total	59·50
Sulphuretted hydrogen	*

All the above springs are typical examples of acid, sulphurous thermal water, and form a pale-green solution, perfectly clear, except that on standing exposed to the air there is a tendency to the precipitation of flocculent sulphur.

Class 2.

There is another class of acid water, constituting a connecting-link between the foregoing and the hot mud-springs—that is to say, an acid water containing a considerable and varying amount of mineral mud in suspension. Such a spring is the Coffee-pot—a spring which it is hard to know whether to class under the head of mud or water—and the Cameron Spring arising a few yards from it. These waters, while owing their virtues partly to the salts and free acids in solution, act still more powerfully from the amount of mineral mud in suspension. They had a great reputation among the Maoris, and have fallen into an altogether undeserved neglect. It is hoped that when the new buildings are erected increased use will be made of them for immersion baths.

* See note to the "Priest" Bath.

COFFEE-POT.

	Grains per Gallon.
Silica	13·86
Sulphate of soda	23·71
Chloride of potassium	0·77
" aluminium	1·46
" calcium	2·04
" magnesium	1·62
" iron	1·47
Hydrochloric acid	7·66
Sulphuric acid	7·60
Total	60·19
Sulphuretted hydrogen	..*

CAMERON SPRING.

	Grains per Gallon.
Sulphate of soda	44·54
Chloride of potassium	1·67
" sodium	12·04
" calcium	5·22
" magnesium	1·28
" aluminium	0·62
Silica	9·22
Hydrochloric acid	5·92
Total	80·51
Sulphuretted hydrogen	..

PAINKILLER.

	Grains per Gallon
Chloride of sodium	46·42
" potassium	1·71
" calcium	2·66
" magnesium	1·47
" iron and aluminium	4·22
Sulphate of soda	29·14
Hydrochloric acid	6·84
Silica	18·02
Total	110·48
Sulphuretted hydrogen	..*

These springs find their way through a thick stratum of mineral mud, which generally reaches to the surface of the ground, but may be entirely overlaid by a thick rocky crust of silica. As a rule they are also characterized by a very large evolution of gas, chiefly sulphuretted hydrogen and sulphurous acid, with a certain amount of carbonic acid, while they differ from the Priest water in the small quantity of alum in solution.

GROUP II.—THE ALKALINE SULPHUROUS WATERS.

We have seen that the acid waters are without parallel in Europe, and possess certain unique advantages for external use. The alkaline waters represent a type common to many of the most famous spas of Europe, and are suitable both for bathing and drinking. They differ from the majority of European waters in being more siliceous, and would be classed as thermal sulpho-carbonated siliceous sodic-chlorinated saline waters.

These waters are characterized by their very high temperature (180° Fahr. to boiling point), perfect clearness, and soft emollient feel. Seen in bulk, in a perfectly fresh condition, they present every gradation of colour between a faint blue and a delicate green, but on standing exposed to the air for some time the water is apt to become opalescent as a result of oxidation.

* See note to the "Priest" Bath.

Used for bathing purposes these waters possess certain medicinal attributes which may be considerably modified by the method of bathing employed. And herein lies their great utility. Taken as simple immersion baths about the body-temperature they act as nervous sedatives, an effect greatly increased by the action of the sulphuretted hydrogen present. Prolonging the immersion, the action of the alkaline salts and the dissolved gases removes the greasy secretions and dead cells of the skin, at the same time flushing it with blood, while the silicates in the water exert a bland emollient action. Hence the value of these waters in certain forms of skin-disease. But it is for douche purposes that these waters are most of all valuable, more especially for that combination of douching and massage known as Aix massage. For this the bland nature of the water, combined with an almost slippery feel, a quality permitting the masseur's hands to glide easily over the bather's skin, and which is really due to a soapy material formed by the action of the alkaline water on the sebaceous secretions of the skin, renders the alkaline waters particularly suitable. Doubtless, too, the siliceous nature of the water increases this effect. At Aix-les-Bains the same quality appears to be due to a low form of vegetable growth in the water called glairine.

For internal administration the alkaline sulphurous waters have valuable properties, and also certain drawbacks, the most serious of the latter being their extremely nauseous taste. Happily, however, if the water is taken at first in small doses, which are gradually increased from day to day, the distaste not only steadily lessens but is often replaced by a positive enjoyment. The water should be taken as fresh and as hot as possible, sipped rather than gulped down, and should be taken on an empty stomach either before meals or in the cooling-room after or before a bath, according to the special effect desired. Thus taken before meals it cleanses the stomach, neutralises acidity, and stimulates the flow of gastric juice in virtue of its alkalinity. In addition, the sulphides, sulphates, and chlorides in solution exert a specific influence on the digestive glands, more especially stimulating the liver, so that the water relieves engorgement of the liver, hæmorrhoids, and, indirectly, constipation. At the same time the amount of iron present, though small, is sufficient to exert a distinctly tonic influence. There remains one important ingredient whose action must be regarded as still open to question—the silica. What therapeutic action, if any, the silicates exert is still a moot point, and my own experience in their use has been hardly long enough for me to venture a positive opinion.

It will be seen from the above that the alkaline sulphurous waters—such as the Rachel—are fairly potent medicines, and not to be taken in indiscriminate quantities without medical advice. More especially patients with greatly enfeebled digestion, profound anæmia, or persons suffering from functional disturbances of the heart should avoid their internal use.

One other application of these waters remains to be considered—their use, in the form of vapour, for inhalation and for vapour baths. At present no facilities exist for inhaling the vapour, but in the new baths I hope to see installed a complete inhalatorium. By increasing the mucous secretions, relaxing the respiratory tissues, and softening and desquamating the epithelium, inhalation of these vapours would be distinctly beneficial in certain cases of chronic bronchitis and asthma.

While on the subject of inhalation it may be remarked that a good deal of involuntary inhalation goes on during a bath, especially when, as in the old form of baths, these are built directly over the source. The amount of sulphuretted hydrogen that bubbles up through the water in the Priest and Postmaster Baths is very considerable, and is largely responsible for the not infrequent cases of fainting in those baths. While possibly not without its use for its action on the skin in the water, and for its action on the nervous system when inhaled, the good is so much more than counterbalanced by the evil that it would be better in all future baths not to build them over the springs, but always to lead the waters to them. The carbonic-acid gas which is present in several of the springs is hardly in sufficient quantity to have any marked therapeutic or toxic effect.

Vapour baths in which the body or part of the body is immersed in the steam arising from the mineral water form a part of the armamentarium of nearly every spa in Europe, and ample provision for them has been made in the designs for the new bath buildings. But, while at present deficient in this respect, Rotorua possesses a "sulphur-vapour bath" which is believed to be unique. From a hot sulphur cavern immediately below the floor of the Blue Bath, steam and hot fumes, principally sulphur-dioxide in a very concentrated form, are led into a vapour "cabinet" of the ordinary type, in which the patient sits immersed with his head projecting through an aperture. It is hardly possible to exaggerate the value of this bath in certain cases. While possessing all the properties of an ordinary vapour bath, the sulphurous fumes of themselves have an intensely stimulating effect on the skin; while, in addition, sulphur in the finest possible powder is deposited on the whole surface of the body. Under such a combination of circumstances quite an appreciable amount of sulphur is absorbed into the system, while at the same time all the effects mentioned before as attributable to immersion in Priest water are brought about. In addition to the complete immersion vapour bath, there has recently been installed a series of "local vapour baths," in which a limb, or part of a limb only, is immersed.

Analyses of the Alkaline Waters, in Grains per Gallon.

	Rachel.	Oil Bath. (Whakarewarewa).	Waikiti (Ohinemutu, 1903).
Sodium-chloride ..	69·43	66·34	38·75
Potassium-chloride ..	3·41	1·46	..
Lithium-chloride ..	Traces	Traces	..
Sodium-sulphate ..	11·80	7·49	2·72
Potassium-sulphate ..	..	..	2·70
Sodium-bicarbonate ..	..	..	20·03
Calcium-bicarbonate ..	..	..	0·82
Magnesium-bicarbonate	..	..	0·74
Iron and alumina oxides	2·41	..	..
Alumina	..	..	0·16
Silica	5·87	..	24·36
Sodium-silicate ..	18·21	2·08	..
Calcium-silicate ..	4·24	3·16	..
Magnesium-silicate ..	1·09	0·76	..
Ferr. silicate ..	..	0·85	..
Totals ..	116·46	82·14	90·28

Also sulphuretted hydrogen and carbonic acid.

Source of the Waters.

The appearance of an acid and an alkaline spring alongside flashes at once across the mind the inevitable query "Why?" How is it that two such antagonistic waters can outflow so closely together without mixing and neutralising one another? Evidently their sources, or at any rate one of their sources, must be far distant from their outlet. Very deep vertical or sinuous fissures in the earth's crust might account for the phenomenon, or one vertical shaft penetrating a horizontal and superficial water-bearing stratum. A close examination of a large number of springs inclined me to the latter opinion.

The foreshore of Lake Rotorua for more than a mile is riddled with acid springs, which seem, so to speak, to ooze from the surface pumice. By digging down a few feet in almost any part of this area one strikes a layer of acid sulphurous water closely resembling the Priest water. It is significant, too, that the temperature of the Priest Baths is materially lowered by a heavy rainfall. The alkaline waters in this area, on the other hand, are ejected with a certain amount of force from deep shafts, whose walls are lined with a silicate deposit soft under the water, of stony hardness where exposed and dry. It is impossible to measure the depth of these shafts, as their walls are not vertical, but they are certainly of considerable depth—the Rachel Spring, for instance, has been

sounded to a depth of 150 ft. There is a close resemblance, both in the nature of the outlet-shaft and in the character of the water, between these springs and the geysers of Whakarewarewa; and even the quietest and most placid pools—such as the Rachel—will exhibit geyser action if the pressure on them is suddenly lowered, as by rapidly running off a large quantity of water.

The physical configuration of the springs, then, would point to the supposition that the Priest water is a superficial layer separated from a deeper level of alkaline water by some impervious stratum, pierced here and there by vertical shafts which allow the alkaline water under a considerable degree of pressure, to reach the surface. To test the truth of this theory shafts were sunk in various parts of the Sanatorium grounds, both in sulphur-beds, where one might expect to obtain hot water, and in apparently sound places overgrown with trees 30 ft. high. In all cases hot, acid, sulphurous water was obtained at a distance varying from 5 ft. to 12 ft. below the surface. Certain strata, more especially a black layer consisting of pumice thickly coated with crystals of marcasite, contained water in larger quantities and at higher temperatures than others, the thermometer registering anything from 110° Fahr. to 160° Fahr. It is probable that chemical action is largely concerned in the production of these local high temperatures, and, as is well known, the natural decomposition of marcasite produces sulphuric acid. An analysis of one of these "artificial springs" will be seen below under heading A. On digging through the floor of spring A we came upon a dense stratum of white clay some 12 ft. thick, and boring through this with a 6 in. iron pipe we came on a plentiful supply of a neutral water, richer in chlorides, of a temperature of 187° Fahr., and altogether more approximating in character to Rachel water (analysis B).

Analysis, in Grains per Gallon.

	A.	B.
Silica	16·80	16·80
Alumina	20·36	4·10
Iron-oxide	1·10	0·15
Lime	0·56	0·56
Magnesia	0·61	0·20
Soda	2·46	13·33
Potash	0·40	0·80
Chloride	3·55	14·41
Sulphuric acid	57·40	12·60
Total	103·24	62·95
Sulphuretted hydrogen	in both.	
Acidity, calculated as sulphuric acid	11·31	Neutral.

The Baths.

The baths of Rotorua are designed expressly to cater for the needs of two distinct types of bathers—those who come for pleasure and those who come for "the cure." For the former there are hot swimming-baths which are amongst the finest in existence. The enormous supplies of hot mineral water available enable us to keep up three large swimming-baths, always filled with water at the body-temperature. These are entirely emptied and cleaned out every week, while a constant stream of clean hot water is always flowing in, and bathers have this additional guarantee of the purity of the water: that unless this constant inflow of fresh hot water is kept up the temperature of the bath must inevitably and rapidly sink.

The Duchess Bath is a fine swimming-bath 40 ft. long and 20 ft. broad, enclosed in a building lofty enough to prevent any feeling of

stuffiness. Here one may get a luxurious swim and a cold shower in independence of the weather. On one side of the swimming-bath is a suite of private rooms containing a bath-room, and a really sumptuous dressing-room, lavatory, cold shower, and hot douche. These baths, which are open to ladies one half the day and gentlemen the other, are all supplied by the Rachel spring, which is noted for the soft emollient nature of its water.

The ladies' swimming-bath, also supplied by the Rachel spring, is open to the sky, and measures 48 ft. by 24 ft.

The third swimming-bath, the Blue Bath, 62 ft. by 23 ft., is reserved for gentlemen, is also open-air, and is fed by the water from the Malfroy geysers.

In the same building is the sulphur-vapour bath already described.

The main block of buildings, the Pavilion Baths, is divided into separate wings for ladies and gentlemen. Here are situated, in addition to the ladies' swimming-bath, the immersion baths supplied by the famous "Priest" water and suites of public and private baths supplied from the Rachel spring. Under the same roof are the mud baths, comprising "complete immersion" and "local" mud baths.

At the ticket-office may be obtained hot Rachel water free for drinking purposes, and cold Te Aroha water—a strongly alkaline saline—at 2d. per glass. It is hoped to be able before long to retail here several of the more important waters of the colony.

Behind the Duchess Bath, in an unpretentious wooden building, are the ladies' and gentlemen's Aix massage baths. These are very comfortably fitted up with cooling-rooms and private dressing-rooms, while the walls of the bath-rooms are lined with plate glass to insure absolute cleanliness. The Rachel water, under hydraulic pressure of about 50 lb. to the square inch, supplies the various douches, and the whole is in charge of thoroughly experienced masseurs and masseuses, who, in addition to a knowledge of massage and douching, are expert in the Swedish movements and gymnastics.

In the same building are rooms fitted up for the employment of dry massage, electricity, and medical gymnastics. Here, as in the Aix massage baths, the attendants do not give any treatment on their own initiative, but work only according to the instruction of the patient's medical attendant. Full written directions are handed in with each case, a prescription in fact, and this is carried out with the same literal exactness as an ordinary prescription is made up by the chemist.

Half a mile away along the lake-shore, in the direction of Whakarewarewa, are the Postmaster Baths, similar in construction to the Priest Baths, with a male and female side, but open to the air. Their special use and nature have already been touched upon.

At Whakarewarewa are the Spout Bath already mentioned, and several other baths at present in private hands.

Tariff.—The cost of the baths is really remarkably low, and varies from 6d. for certain public baths to 3s. 6d. for the "double Aix massage."

Season.

The season may be said to last all the year round, for while the great majority of visitors crowd to Rotorua during the summer, there are large and increasing numbers who have learned from past experience that Rotorua is much more comfortable in the autumn, when we frequently enjoy week after week of still, clear, bracing days, with a genial sun and an absence of that gusty wind which is the chief drawback of the climate in early summer. Even in winter similar weather is by no means uncommon—bright sunny days, with sharp frost at night.

Routes of Access.

Rotorua may most easily be reached by rail from Auckland. The express leaves Auckland every morning, arriving in Rotorua in comfortable time for dinner in the evening. As a dining-car is now attached to this train the journey can be made very much more comfortably than heretofore. This train connects with the Australian boat from Sydney to Auckland.

Another route is overland *via* the Wanganui River and Taupo; a most interesting and charming way in summer, but, owing to the long coaching journey, somewhat uncomfortable in winter.

Accommodation.

There are four hotels and over twenty boardinghouses, and the number of the latter is steadily increasing; still there is often a great demand for accommodation, and during the height of the season, especially if some special function such as the Carnival or a public holiday is on, it would be wise to engage rooms in advance.

Length of Time Required for a Cure.

This it is impossible to state, so much depending on the nature and severity of the case, but, striking an average, a month would be a very fair allowance. Indeed in very severe cases it is as a rule better not to prolong a stay over several months, but rather to go away after six weeks or so and return later.

The sufferer must not expect a Pool of Bethesda at Rotorua: we do not profess to do impossibilities, and are only too well aware of our limitations; but this much may be affirmed with absolute sincerity, that nowhere in the known world exist finer bathing-waters for the relief of suffering humanity.

Waiotapu.

Taking coach at Rotorua, and turning sharply to the right from Whakarewarewa, a drive of twenty-one miles brings one to Waiotapu. From the time the first gorge is left, with boulder-strewn Puarenga rushing far below, the conduit supplying Rotorua with water winding snakily beside it, the road is comparatively uninteresting until Kakaramea is reached.

Maunga Kakaramea—Rainbow Mountain—owes its name to the extraordinary richness and variety of colouring of its steeper slopes, due to the coloured earths of which it is largely composed. In a single roadside cutting one may pick up specimens of earth of the most intense red, purple, and orange, with every gradation through delicate pinks, greys, and greens to pure white. There is an easy track to the summit.

Passing an intensely green still lake at the foot of Kakaramea, a short drive brings one to the Waiotapu Hotel.

Many people look upon Waiotapu as merely a place to halt at for lunch on the road to Taupo, but it is well worth spending a few days here. Space forbids anything like an adequate description of this wonderful valley. Here may be seen on a gigantic scale every kind of hydro-thermal activity: enormous boiling cauldrons, mud geysers on a scale nowhere else attempted, hot cascades and waterfalls, steam-holes, alum caves, and an immense variety of mineral waters.

Wairakei.

From Waiotapu the road leads across an interminable pumice plain to Taupo. The Waikato River, now rolling majestically, now thundering over falls and rapids, alone breaks the monotony of the journey. Away to the left can be seen the steam from the Ohaki Spring, while in the far distance rise the snowy peaks of the volcanoes Ruapehu and Ngauruhoe.

A few miles before reaching Taupo we come to Wairakei, a veritable oasis in the desert of pumice, fern, and manuka. On no account should the traveller miss Wairakei. Waiotapu holds us with its weirdness, but Wairakei is magnificent. Through the hotel gardens, fed by innumerable springs, runs literally a river of hot water, in which you can swim under the overarching trees, a cold stream running alongside for the delectation of the hardier spirits; at points along the stream cascades of hot water form natural shower-baths amid fern and moss and shrub. Finally, in one high fall, the mineral water serves a purpose which is, I believe, unique—to drive a water-wheel and cut chaff.

There are two main groups of springs in two distinct valleys: one, the smaller, consisting of a large number of springs of an aluminous, sulphurous, and chalybeate nature, the overflow of which constitutes the hot river; and the other, and larger, the "Geyser Valley," in which most of the waters are of an alkaline saline nature. Here may be seen a large number of geysers of all sizes, which differ from those of Whakarewarewa in the extreme frequency and regularity of their action and in their beautiful surroundings. Any one with half an hour to spare may be quite certain of his patience being rewarded by seeing at least one geyser play.

Taupo.

Many miles before reaching Wairakei the landscape is dominated by the frowning extinct crater of Tau Hara. As the road twists

and turns round the low hills at its base, the great mountain seems ever elusive, never getting nearer, and, in fact, even when we reach Taupo after hours of driving, we seem still as far off the mountain as ever. This peculiarity of a conical mountain is due of course to the fact that one face of it is so much like another as to be indistinguishable; we have simply driven round it. The same phenomenon is very noticeable in passing Mount Egmont.

The Aratiatia Rapids may be visited from either Wairakei or Taupo, but a splendid view of the Huka Falls may be obtained from the coach-road between Wairakei and Taupo. It is a really magnificent sight to see the huge mass of purest water, of the most delicious green colour, pour thunderously over the falls. One realises what an immense force it is the electrical engineers propose to harness.

Taupo is a pretty little place overlooking the lake, and commanding quite a Swiss view of the snowy giants opposite.

There is a choice of three hotels for the traveller: the Lake Hotel, most convenient for the steamer and the through route to Wanganui; the Spa, and the Terraces, with hot mineral baths attached.

Taupo, standing as it does at an altitude of 1,250 ft. in the very centre of the North Island, with a fine bracing climate, a magnificent lake, and absolutely unlimited supplies of hot mineral water, can hardly fail to become in the future one of the foremost health resorts of the country.

The Spa Hotel consists of a series of cottages grouped about a pretty garden, through which runs a stream of hot mineral water. There are a number of comfortable baths, and several kinds of mineral water flowing in astounding quantities. The whole is in a sheltered sunny valley, and should prove a perfect haven for those in search of a quiet restful winter resort.

Some 200 ft. above Taupo is the Terraces Hotel. In its grounds is a deep and picturesque ravine in which arise a large number of springs of different kinds. The outflow of mineral water here is really enormous, and many of the springs possess valuable medicinal properties.

In addition to several hot springs which arise from the shore of the lake between the Terraces and the Lake Hotel, there is another group along the bank of the Waikato River, including some exceedingly interesting geysers.

At Tokaanu, across the lake, are several very large hot springs, of varying nature, which on account of the enormous number of springs in this district have been comparatively neglected. Had they been situated in any European country they would long ago have obtained worldwide reputation.

Orakei Korako.

Orakei Korako may be reached either by driving over from Wairakei or by riding from Atiamuri by the new road beside the Waikato, a most picturesque route.

There are two objects at the springs which are alone well worth going to see—the Terraces, which since the destruction of the Pink and White Terraces are the finest in the colony, and the Alum Cave. Surely if any spot deserved the epithet "fairy" it is this grotto. In a cliff overlooking the Waikato, with the everlasting dingy scrub and scrubby fern around, one suddenly comes on an opening in the cliff half-hidden with vegetation. Descending by a rough boulder-strewn track, one enters fairyland. A hundred feet overhead the cliff-face shelves into the grotto. Purple and orange, green and crimson, the roof is iridescent with every colour, while at the very bottom of the grotto, where painted roof meets painted floor, is an exquisitely beautiful pool of hot water, delicately green, its perfectly still surface reflecting the coloured walls. The sloping floor of the cave is filled with stately nikau palms, growing luxuriantly in the warm steamy atmosphere. To the left of the pool is a narrow opening leading into a large cave, whose floor is a pool of hot water, and whose atmosphere is like the hottest room of a Turkish bath. Here the guide will momentarily disappear, to appear torch in hand in the mysterious depths, lighting up the cave with weird effect. The atmosphere, however, does not invite too long a sojourn.

There are a very large number of valuable mineral springs at Orakei Korako, but on account of the inaccessibility of the spot they have hitherto been used only by the Maori.

Okoroire.

These springs may be reached from Rotorua either by rail or road. In either case, the route passes through charming scenery.

Taking the coach by preference, and skirting the foot of Ngongotaha along the western side of the lake, we reach the bush some ten miles from Rotorua, after a long pull uphill. Thenceforward the road runs for miles through beautiful bush scenery, and by the time the mid-day halt is made the keen air—we are some 2,000 ft. up—has made lunch a welcome duty. As the coach begins the descent of the opposite face of the mountain-chain the scenery gets finer and finer, until it culminates in a magnificent panorama of wooded ridge and rocky crest, with deep luxuriant gorges in between, and, beyond the broad valleys of Thames and Waikato, the far horizon serrated with blue hills. A few miles across the plain and we come to Okoroire.

Here the River Waihou forces its way through a narrow cleft of rock, foaming into a broad basin, on whose margin are situated the springs, overhung with trees and banks of fern. Close behind is the hotel with its lazy verandahs, its orchards, and its farmyard. The waters, which are mildly saline and comfortably hot, have been led into the baths close to the river-side, and constitute a particularly pleasant and inviting dip. Jammed in the narrowest cleft of the river's course is all that is left of a large Maori canoe which tradition says was wrecked in its present situation during a foolhardy and fatal attempt by a visiting tribe to paddle through the

rapids. There is good trout-fishing in the river, and altogether for the angler, and for the bather in search of quiet comfort, Okoroire is a charming spot. Within driving distance of Okoroire are the fine hot springs of Mata Mata, which are well worth a visit and a bathe in.

Upper No. 2 Bath.—Analysis.

	Grains per Gallon.
Calcium-sulphate	2·77
Magnesium-chloride	0·69
Sodium-chloride	9·48
Sodium-carbonate	17·18
Potassium-carbonate	1·42
Iron-oxide	1·10
Silica and silicates	9·70
Total	42·34

Flow, 1,300 gallons per hour. Temperature, 113° Fahr.

Fairy or Open-air Bath.—Analysis.

	Grains per Gallon.
Calcium-sulphate	2·42
Calcium-carbonate	1·84
Magnesium-carbonate	1·03
Sodium-chloride	4·34
Alkaline oxide	11·41
Iron-oxide	0·70
Silica and silicates	9·82
Total	31·56

Flow, 4,100 gallons per hour. Temperature, 99° Fahr.

Te Aroha.

One of the best and, certainly one of the prettiest, resorts in New Zealand is Te Aroha. Nestling at the foot of a high richly-wooded mountain, on the edge of a wide plain, the first view of it from the railway recalls irresistibly one of those pleasant little watering-places one finds in quiet nooks on the Continent of Europe. Only a chalet or two perched among the pines is wanted to make the illusion complete.

Situated in a large garden, prettily terraced on the hillside, are dotted about a large number of baths. Some of these are small buildings erected either over or alongside a spring, as, for instance, No. 1, which is reserved for ladies; but the central block consists of quite a handsome and picturesque bath-house, with a large number of private baths, and, with the exception of the Aix massage bath at Rotorua, is the most up-to-date bathing establishment in the colony.

The climate of Te Aroha is mild and sedative, and in this respect is more suitable than either Rotorua or Hanmer for elderly persons and patients suffering from bronchitis, emphysema, degenerative changes in the vascular system, or kidney-disease.

While Rotorua is essentially a bathing resort, Te Aroha is a spa for drinking the waters. These would be classed as thermal carbonated sodic-muriated alkaline-saline, and closely resemble the celebrated waters of Vichy and Ems, but are considerably richer in the essential medicinal ingredients — the bicarbonate, chloride, and sulphate of sodium.

As compared with most of the mineral springs of New Zealand, the outflow is not great, but it is enough not only to supply all possible drinking requirements, but also a large number of immersion baths.

ANALYSIS IN GRAINS PER GALLON.*

Spring.	Sodium-bicarbonate.	Sodium-chloride.	Sodium-sulphate.	Potassium-chloride.	Calcium-carbonate.	Magnesium-carbonate.	Ferrous-carbonate.	Alumina.	Silica.	Total.	Temperature (Deg. Fahr.).
1	461·56	60·25	38·32	1·72	10·77	6·86	Trace	Trace	7·56	586·96	135
2	426·29	60·45	32·67	1·90	7·12	4·21	„	„	7·12	539·76	..
4	246·49	34·24	19·16	..	4·62	2·14	„	„	5·17	311·82	Cold.
6	499·75	66·23	35·14	..	7·12	2·99	„	„	7·14	618·37	..
8	451·97	66·14	32·91	1·96	7·47	4·21	„	„	8·60	573·26	109
13	301·64	40·67	21·86	..	6·11	3·13	..	..	6·86	380·27	135
14	321·64	42·61	23·16	.	7·14	3·49	..	..	6·66	404·70	135
15	321·76	43·11	22·16	..	6·91	3·61	..	..	7·05	414·60	130

Also carbonic-acid gas in all.

* A large number of springs hitherto given in the Year-book are omitted, some of them being now extinct, merged in other springs, or so insignificant as to be unimportant. The temperatures of Nos. 2, 4, and 6 cannot be given, as they flow through the floor of large baths.

Drinking the Waters.—The springs generally used for this purpose are No. 8, which supplies the octagon fountain, and No. 15. Drunk fresh from the spring, the water is by no means so unpalatable as might be expected, considering the very large amount of bicarbonate of sodium in solution. It is well to begin with small quantities—say a third of a glass—sipped three times a day on an empty stomach, the dose being gradually increased till four or five glasses a day are taken. As a rule, the water should be taken about half an hour to an hour before meals, or two hours after meals, beginning with a glass in the early morning, followed by a short walk before breakfast, or a bath, or both, another glass about noon, and a final glass about 9 at night. The next step would be a fourth glass about half-past 3 or 4 in the afternoon, and then one half an hour before dinner.

The waters act as antacids and diuretics, and have also the effect of liquifying bronchial, hepatic, and other secretions. Owing to

the presence of considerable quantities of sodium-chloride they are less "lowering" than simple alkaline waters, and in this respect resemble the waters of Ems rather than those of Vichy. In many persons they have a distinct laxative effect, partly due to the indirect action of the carbonates and chlorides in solution, and partly to the sulphate of sodium.

Used as baths the waters have a remarkably cleansing action on the skin, due to the solution of its fatty secretions by the strong alkali, an action invaluable in promoting skin-excretion and in those skin-diseases in which seborrhoea is a marked feature.

Indications.—Drinking: Acid and hepatic dyspepsia, gall-stones, gout, gouty diabetes, certain forms of urinary trouble, chronic bronchitis, and some forms of obesity. *Bathing:* Chronic gout and rheumatism; certain skin-diseases, especially if associated with seborrhoea; catarrhal conditions of the female pelvic organs.

Contra-indications.—Patients greatly enfeebled and run down, as in many cases of true rheumatoid arthritis, in advanced diabetes, and in low forms of gout and rheumatism.

HANMER.

What Rotorua is to the North Island, Hanmer is to the South. While by no means the only hot springs in the South Island, those of Hanmer are the only ones of any magnitude at present easily accessible, and they have an especial importance in that they can be reached by train from the most populous centres of the South without, what is to invalids often a serious drawback, the discomforts of a sea-passage. Hanmer is some thirty-two miles from the east coast, and in latitude 42° 30′ S.

Access.—The principal route, and the only one practicable for invalids, is by train from Christchurch to Culverden, a distance of sixty-nine miles, and thence twenty-four miles by coach to Hanmer. The journey can be comfortably managed in a day, leaving ample time for lunch at the Culverden Hotel, and a break in the coach-ride for tea at a picturesque little hostelry, reached just before the descent into the Hanmer Plains.

Accommodation.—There is excellent accommodation at the Government "Spa," which is practically an hotel without a license. Provision is made in separate quarters for fifteen first-class and sixteen second-class guests, while three beds are reserved for patients receiving free treatment. Inside the Spa gardens, and within a couple of hundred yards of the house, are the hot springs and the bath-buildings, so that the site is as central and convenient as could well be wished. In addition to the Spa, there are several good boardinghouses, and, two and a half miles away, the Jollie's Pass Hotel. Altogether some three hundred visitors can be accommodated at Hanmer.

Climate.—Situated on an elevated plateau 1,220 ft. above sea-level, rimmed round by high mountains, and shut off by the central mountainous backbone of the island from the warm moist west winds, Hanmer possesses in its climate a curative factor scarcely less valuable than its mineral waters. The air is comparatively dry, absolutely pure, and has just that touch of keenness in it which exhilarates and lessens fatigue—in a word, is "bracing." At this altitude the atmosphere is more diathermous and translucent than at the sea-level; the temperature in the direct sunshine is higher and in the shade lower, and distant details show up with a clear-cut outline which makes them deceptively near. The prevailing wind is from the north-west, and the wettest months are in the spring and autumn. Rain falls on about 104 days in the year, and the average rainfall is about 43 in. There may be said to be two distinct "seasons" at Hanmer—the summer, when most people visit it, and the winter, when it holds out considerable attractions to those who need bracing up and are yet not too invalided to endure the keen frosty air.

The Mineral Waters.—The hot sulphur waters arise within the Spa grounds from a number of springs, which all appear to have a common origin. The temperature of these springs varies from about 100 degrees Fahr. to 114 degrees Fahr., and they issue from the earth accompanied by a fairly copious evolution of sulphuretted-hydrogen gas, the excess of which, by an ingenious device, is collected and utilised for the lighting and heating of the Spa.

The waters are saline in nature, with a faintly alkaline reaction, the principal ingredient being sodium-chloride, and they would therefore be classed as sulphuretted saline waters, or, to give them their full title, as thermal sulphuretted sodic-muriated saline.

Analysis in Grains per Gallon.

Chloride of sodium	62.09
Chloride of potassium	0.15
Chloride of lithium	Trace.
Iodide of magnesium	Trace.
Carbonate of lime	0.55
Carbonate of magnesia	1.77
Carbonate of iron	0.05
Sulphate of sodium	7.48
Carbonate of sodium	2.66
Phosphate of alumina	Trace.
Silica	2.63
Total	77.38

Also sulphuretted-hydrogen gas.

From the above analysis it will be seen that the waters closely resemble the alkaline sulphuretted waters of Rotorua of the "Rachel" type, but contain more alkaline carbonate and much less silica. They are therefore distinctly better waters for internal administration, and, indeed, approximate more closely to some of the most celebrated European sulphur-waters.

Drinking the waters is usually combined with taking the baths, the nauseous taste of the sulphides in the water being the principal drawback to its internal administration. The water is drunk hot and fresh directly from the spring, and, like most sulphur waters, will not keep when bottled. The usual dose is from a quarter to two pints a day, sipped on an empty stomach. Taken in this way, its principal uses are—(1.) As an antacid and hepatic alterative in certain cases of dyspepsia, abdominal plethora, hæmorrhoids, and engorgement of the liver. In many cases of neurotic dyspepsia the taste of sulphuretted hydrogen is rather an advantage than otherwise. (2.) In cases of chronic gout, rheumatism, and metallic poisoning, to increase metabolism and flush the system.

The Baths.—There are several bath-buildings dotted about the gardens, their positions having been originally determined either by the site of a spring or by the contour of the ground enabling mineral water to be led into them.

Of the former class are the *men's and women's swimming-pools*, two walled-in enclosures containing oval concrete baths, some 30 ft. long by 20 ft. wide and 4 ft. 6 in. deep, open to the sky, but protected from the direct rays of the sun by awnings. These baths are kept at slightly below the body-temperature, and constitute a delightful dip, rendered all the more pleasant in that the excess of sulphuretted hydrogen is removed from the water.

The private baths, some twenty-two in number, are housed in three separate buildings, and are of the ordinary shallow immersion type. They are fitted with cold showers, are clean and comfortable, and are altogether of a less primitive type than the similar plunge-baths at Rotorua. Special baths are reserved for patients suffering from diseases of the skin.

Massage-rooms, in charge of male and female operators, are provided with hot and cold douches, hot-air cabinets, and a needle bath. It is intended shortly to replace the present low-pressure douches by a high-pressure system, so that true Aix massage and douche-treatment can be given as at Rotorua.

Inhalation.—The present arrangements for inhaling the vapour of the mineral water are somewhat primitive, consisting of a couple of pipes leading from a roofed-in spring into the open air. Patients sit on seats placed immediately above the spring, and inhale the hot vapour as it issues from the pipes. In fine weather there are distinct advantages about this open-air method, while the steaming of the face, which necessarily takes place in inhaling from the somewhat large apertures, exerts an emollient action on the

skin. It is rumoured that it is not unknown that visitors, hearing of this cosmetic property, have developed a sudden bronchial affection necessitating inhalation. It is intended shortly to erect an inhalation-room and a natural vapour-bath over the spring.

Cases suitable for Treatment.—The baths are indicated in most cases of gout and rheumatism in a chronic or subacute stage, and in local manifestations of these diseases, such as sciatica, lumbago, and certain forms of neuralgia and mild neuritis. Patients suffering from true rheumatoid arthritis are likely to receive benefit from the combination of the bracing climate with the mineral-water treatment, but the latter requires most stringent medical regulation, and is easily overdone.

The same remarks apply to many forms of anæmia, general debility, nervous exhaustion, and insomnia; and, indeed, it cannot be too strongly insisted that mineral-water treatment, while capable of doing great good, is capable, if misapplied, of doing fully as much harm. Cases of chronic poisoning by metals, such as lead, and by certain constitutional diseases, are likely to be benefited by the combination of the external and internal use of the waters.

Many forms of dyspepsia will be greatly benefited by the combination of drinking the waters and bathing, together with a carefully regulated diet. Here, again, while the bracing climate assists the cure and stimulates the appetite, it must be remembered that the increased appetite must be restrained at first by the dyspeptic.

Certain skin-diseases, notably the dry forms of eczema and mild cases of psoriasis, are usually benefited, but much longer immersion is required than is advisable in the treatment of most other diseases. Special baths are set apart for these cases.

Convalescents from acute diseases will find the pure upland air markedly invigorating, but must be careful in the matter of bathing.

Certain forms of kidney-disease may be improved by cautious use of the hot baths and vapour-cabinets.

Lastly, many cases of chronic bronchitis and asthma benefit by the inhalation of the mineral-water vapour, the sulphuretted hydrogen of which, combined with the warm steam, has a bland sedative action on the mucous membranes, while at the same time the vapour tends to liquefy the bronchial secretions.

Contra-indications.—As already pointed out, the waters must not be used indiscriminately in each and every case, and in certain cases not only will no good be likely to result, but there is considerable risk of great harm being done. Invalids should never embark on a course without medical advice, and should specially avoid taking very hot baths or prolonged immersion on their own responsibility. The waters should not be taken internally by persons suffering from severe anæmia, functional disturbances of the heart, or very enfeebled digestion.

Medical Attendance.—The Government medical officer, Dr. Little, resides at Culverden, and visits Hanmer regularly. In cases of urgent necessity he can always be communicated with by telephone. A booklet, "The Mineral Waters and Health Resorts of New Zealand," "Section 2, Hanmer," giving further information in regard to the waters, is being issued free by the Government Department of Tourist and Health Resorts.

OTHER GOVERNMENT TOURIST AND HEALTH RESORTS.

Mount Cook.

The Mount Cook Hermitage Hotel—under the control of the Government Tourist Department—is situated in the heart of the Southern Alps. The Hermitage is 2,506 ft. above sea-level. It is reached from Christchurch or Dunedin by rail and coach. Trains connect at Timaru for Fairlie, thirty-nine miles. At Fairlie the traveller changes to the coach for the rest of his journey (ninety-six miles). A night is spent *en route* from Fairlie to the Hermitage at Lake Pukaki, where there is a Government hotel. Guides and horses are obtainable at the Hermitage. The hotel is a building of thirty-five rooms, with stabling and paddocks for horses. Cook's coupons are accepted at the Hermitage. The glaciers within easy distance include the great Tasman Glacier (one of the largest in the world), the Murchison, Godley, Mueller, and Hooker. Mount Cook (12,349 ft.) and the surrounding mountains are within convenient distance of the Hermitage. From the Ball Hut (3,404 ft.) and Malte Brun Hut (5,700 ft.), erected for the shelter of climbers, in the vicinity of Mount Tasman, many alpine excursions may be made. The Ball Hut is twelve miles, and the Malte Brun about twenty miles from the Hermitage. The west coast may be reached from here, *vid* the Hooker Glacier, Fitzgerald's Pass, and the valleys of the Copland and Karangarua Rivers.

The Southern Lakes.

The most easily accessible of the Otago lakes is Wakatipu, which is fifty-four miles long, 1,069 ft. above sea-level, and has a depth of 1,252 ft. Queenstown, on the shores of this lake, is reached in one day from Dunedin or Invercargill by rail (174 miles or eighty-seven miles) to Kingston, thence by Government steamer twenty-five miles. From Queenstown, where there is good hotel-accommodation, the ascent of Ben Lomond (5,747 ft.) and other mountains may be made on horseback. The Government steamers run to Kinloch and Glenorchy, at the head of the lake, whence excursions may be made to Mount Earnslaw (9,300 ft.), by horse and on foot, to Paradise (by buggy), and to the Routeburn Valley, the Dart River, Rere Lake, &c.

There is an alpine route through from Greenstone on the shores of the lake, *via* the Hollyford River, to Martin's Bay on the west coast (sixty-three miles), also a track from Mount Nicholas to Lake Te Anau *via* the Keys.

Lake Wanaka (928 ft. above sea-level and thirty-five miles in length) may be conveniently visited from Wakatipu. A coach runs from Queenstown to Pembroke, on Lake Wanaka, a distance of forty-one miles. The service is bi-weekly in summer and weekly in winter. There are hotels at Pembroke, and an accommodation-house at Makarora (the head of the lake). Steamers ply on the lake and may be hired as required. Lake Hawea (134 ft. above Wanaka) is ten miles distant by a vehicle-road. There is good red-deer stalking in the vicinity; trout abound in the streams and in Lakes Wanaka and Hawea. A track leads from the head of Lake Wanaka over the Haast Pass (sixteen miles distant) to the west coast, connecting with the road to Hokitika.

Lake Te Anau, forty-two miles long, and 694 ft. above the sea, is reached by train and coach from either Dunedin or Invercargill—train to Lumsden, thence a coach journey of fifty-two miles to Te Anau, occupying a day. There is a comfortable hotel at the coach terminus on the shores of the lake. A small steamer runs to the head of the lake, where there is an accommodation-house. From here visitors may walk to Sutherland Falls and Milford Sound. The track leads up the Clinton Valley, over Mackinnon's Pass to the Sutherland Falls (nineteen miles), and Milford Sound (thirty-five miles). The Sutherland Falls (1,904 ft.) are the highest in the world. There are shelter-huts at convenient distances along the route. Guides are obtainable at Te Anau. There is an accommodation-house at Sutherland's, Milford Sound, opposite Mitre Peak. An oil-launch is available for excursions on the Sound. From the upper part of Lake Te Anau there is a good track to George Sound (thirteen miles), *viâ* Lakes Hankinson and Thompson. A rowing-boat is available on the Sound, and huts are provided for visitors.

Manapouri Lake (elevation 597 ft.) is visited from Lake Te Anau. The distance between the lakes is six miles, but the accommodation-houses are thirteen miles apart. A coach traverses the intervening distance, in connection with the steamers on the lakes and the coaches from Lumsden. Manapouri may also be reached by coach (thirty-eight miles) from Otautau, which is thirty-two miles from Invercargill by rail. Manapouri is the deepest of the New Zealand lakes, having an extreme depth of 1,452 ft. There is a small steamer on the lake; it may be engaged by visitors as required. This lake is regarded by many as the most picturesque in New Zealand.

Stewart Island.

Stewart Island is reached by steamer (weekly service) from the Bluff, a distance of twenty-four miles. There are accommodation-houses at Oban (Half-moon Bay), where the steamer calls, and at

the bays round the coast. An auxiliary oil-ketch and other boats may be hired at Oban for coastal cruises, and excellent fishing is to be obtained. Bathing, boating, and deep-sea-fishing excursions are the chief attractions of the island. Walking-tours may also be made to the summits of Mounts Anglem (3,200 ft.) and Rakiahua (2,217 ft.), and other wooded peaks.

Small coasting-boats (sail and screw) take visitors when required to Paterson Inlet, the Neck, and other scenic resorts. Two of the most attractive spots, Port Adventure and Lords River, may be visited in one day from Oban. The boardinghouses at Oban are capable of accommodating a large number of visitors; there are several stores in the township.

PART IV.—DESCRIPTIONS OF LAND DISTRICTS.

THE AUCKLAND LAND DISTRICT.

James Mackenzie, Commissioner of Crown Lands.

Introductory.

The Auckland Land District covers about four and a half degrees of latitude, with an area of 13,85[illegible],000 acres, extending from 34° 30′ to 39° S., its greatest length being about 365 miles, from the North Cape to the 39th parallel, south of Lake Taupo, while its greatest width is about 180 miles. In the peninsula north of Auckland, indented as it is on either side by harbours and arms of the sea, and with a mean width between the Pacific Ocean and Tasman Sea of little over forty miles, the range of temperature is remarkably small. The thermometer seldom registers above 80° in the shade in the middle of summer, whilst the heat is always tempered by a cool breeze, bringing the mean summer temperature to under 70° in the shade. The frosts are hardly worth mentioning, as the minimum register is seldom below 40°; but south of Auckland sharp white frosts occur very often, more especially beyond 38° of latitude, and snow lies upon the summits of some of the highest hills or mountains in winter.

Physical Features.

This land district may be said to have no real mountains, as the most prominent peaks of the several scattered ranges or hills seldom exceed 3,000 ft. in height above the sea-level, an altitude just enough—south of 38°—to clothe the last 1,000 ft. with snow in the depth of winter. North of Hokianga and the Bay of Islands there is one well-defined range of hills rising to a height of 2,463 ft.; whilst south of these places, and extending to the Wairoa River on one side and the Whangarei Harbour upon the other, the country is all more or less broken into ranges from 1,000 ft. to 2,000 ft. in height, with valleys between. The next really well developed main range lies within the Coromandel and Thames Peninsula. With a length of over 150 miles, it has an average height of over 2,800 ft., commencing with Moehau, or Cape Colville, 2,935 ft.; next, Te Aroha, a peak of 3,176 ft.; and ending at Weraiti with a height of 2,527 ft. There are two other well-defined ranges—namely, Tawairoa and Hauturu—lying between the West Coast and the Waipa basin, with their highest peak at Pirongia, which rises to 3,156 ft., and is often snow-capped. There are other ranges forming the watershed between the basins of the Waikato and Waipa Rivers, and dividing both from the streams running into the western side of Lake Taupo. Their highest peak is Pureora, rising to 3,793 ft. The eastern side of the land district is occupied by a very broken, forest-clad country, known as the Urewera country, the average height of which is about 2,500 ft. It is practically unexplored, and, being still in the hands of the Natives, is not as yet available for settlement. To the east of Lake Taupo lie the Kaimanawa Ranges, of about 4,500 ft., and generally open on the ridges, with valleys clothed in beech forests. Nearly the whole of the Auckland Land District is indented on both coasts with harbours and arms of the sea, forming a cheap and easy means of access. Of rivers, properly so called, there are only two of any great length—namely, the Wairoa and Waikato. The first empties itself into the Kaipara Harbour, a large arm, or rather succession of arms, of the sea, giving hundreds of miles of inland water-carriage to all parts of the Counties of Hobson, Otamatea, Rodney, and Waitemata. This river is navigable from its mouth to its junction with its

tributaries Wairua and Mangakahia, a distance of ninety-one miles from the sea, and for forty miles it is navigable for ships of large burden. The River Waikato has a course of 200 miles, measured from its source in the Ruapehu Mountain through Lake Taupo to the sea on the West Coast. It is navigable for river-steamers for seventy-five miles from its mouth, and its tributary, the Waipa, for twenty miles from its confluence with the Waikato at Ngaruawahia. Another river —the Thames, or Waihou—though of no great length, affords a valuable means of inland water-carriage, and is navigable for small steamers for twenty-five miles. Generally speaking, every part of the district has an abundant water-supply, now and then lessened for a short time at the end of a very dry summer.

Plains.

Of plains proper, this district has only the stretch of country called Kaingaroa, extending from the eastern side of Lake Taupo towards the Bay of Plenty, all more or less of a pumice formation; the valley of the Thames, and the delta between the Thames and Piako Rivers, which is generally level, the quality of the soil varying very much in different parts; and the Central Waikato basin, already thickly settled. Here and there in the North there are level plateaux of volcanic soil, more or less densely wooded, and along the main rivers there are stretches of level country, but there are no large plains of alluvial soil such as the Middle Island can show.

Lakes.

Of these, which add so much to the scenery of a country, this district possesses a fair share, there being eight principal lakes, with some twenty or more smaller ones. To the north of Auckland, in the Bay of Islands district, there is only one lake of any size, called Omapere, three miles by two miles, an old crater. In the Waikato are Lakes Waikare and Whangape, the first six miles and a half long by three miles across, and the second five miles by one mile. These lakes are generally covered with numerous wild swans and ducks, and, being both connected with the Waikato River by navigable creeks, form a convenient waterway for transport of goods to settlers living around their shores. All the remaining lakes of large size are within the watershed of the Thermal-springs District, and are mostly from seven to eight miles long, and from three to six miles wide, except Taupo Moana, the queen of the North Island lakes, which is twenty-five miles long and eighteen miles broad, with a depth of 500 ft. The scenery round its western shore is of the most romantic kind.

Forests.

The greater part of the Auckland Land District has been covered in the past with dense forests, which are now fast disappearing under the axe of the settler and being transformed into rich pasture-land. The only really good Crown lands fit for settlement in the North are still all covered with forest, and must be cleared and sown before any returns can follow. The area of forest land in the Auckland District at the present time is about 1,300,000 acres north of Auckland, and 3,320,000 acres south of it. The forests contain a mixture of trees of all kinds, from the giant kauri to scrubby tea-tree or manuka, but all the bush is useful for building, fencing, and household purposes, or at any rate may be converted into charcoal for sale. Of kauri (the most valuable tree in New Zealand) great quantities are being yearly cut and exported or used for home consumption.

Soils.

With respect to the soils of Auckland, nowhere in New Zealand within such short distances is there such a diversity in the quality—a distance of half a mile often makes all the difference between rich alluvial and barren pipeclay. To the north of the Bay of Islands and Hokianga the lands are chiefly clay and sandstone, with here and there a volcanic area intervening. In and about the valley of the Mangonuiowae River, in the Hokianga County, there is some of the richest alluvial soil in the district; and, taking the whole Crown land remaining to the north of a line between the Hokianga and Bay of Islands Harbours, the really available good land fit for settlement would be about 40,000 acres. There are large

areas outside of this which will carry good grass and feed one or two sheep to the acre, after clearing and laying down in grass; and there is also land highly suitable for fruit-growing. South of Hokianga, and between that place and the Wairoa River, the soil is, generally speaking, very good, being both volcanic and alluvial. Here the Crown has probably 120,000 acres of such land fit for settlement. Immediately south of the Bay of Islands, and extending thence to Whangarei, the soil is, for the most part, clay lying upon sandstone or marl, with alluvial flats in the bottoms of the valleys; but these are, as a rule, very narrow. Within the Puhipuhi State Forest there is an area, say, of 16,000 acres, more or less, of volcanic soil. Approaching Whangarei, at Hikurangi, the limestone crops out, overlying coal-deposits, and round Whangarei itself the soil becomes a rich volcanic, in a high state of cultivation. South of Whangarei Harbour, and from thence to Auckland, the Crown lands generally are of a broken character, with soil varying from alluvial swamps—as in the case of the Tokatoka Swamp of 16,000 acres—to the limestone areas round Maungaturoto, the sandstone and clay lands of Rodney County, and the poorer clay lands lying north of the City of Auckland, which have, however, proved eminently suitable for fruit-growing.

For about 200 miles south of Auckland the land (with the exception of the Cape Colville Ranges) is, generally speaking, far less broken, and gradually opens out into large tracts of level country in the Waikato and Waipa basins. Immediately south of Auckland the soil is rich volcanic until it is gradually superseded by the prevailing clays; the greater portion of Manukau County, for thirty miles south of Auckland, may be classed as pastoral, and is under occupation as such. The Crown areas available for settlement—say, 13,000 acres—are chiefly in the Otau Parish, varying from volcanic clay to ordinary clay land, forest-clad, and well adapted for pastoral purposes. In the Counties of Waikato, Raglan, Waipa, Piako, West Taupo, and Kawhia, there is a still greater diversity of soils; Raglan County contains large areas of good limestone country, broken, but with rich black soil, and carrying most luxuriant grass. The lower Waikato country consists of clay soil and extensive swamps, almost undrainable, but at a distance of eighty miles from Auckland is found a flat and undulating country, lying partly within the Waikato and Waipa basins, and partly within the valleys of the Piako and Waihou Rivers, formed mainly of alluvial deposits of rhyolite sands brought down from the volcanic districts. In the Kawhia County there are some 300,000 acres of excellent limestone land, a large portion of which is heavily timbered, with numerous warm valleys. Most of this land has now been acquired by the Government from the Native owners, and is being opened for settlement. Beyond this there is a large stretch of country consisting alternately of open valleys and forest-clad hills, a fair proportion of which is good land, both pastoral and agricultural. The County of Coromandel, with portions of Thames and Ohinemuri Counties, is chiefly devoted to the mining industry. The soil is nearly all clay, the land very broken, but suitable for pastoral purposes if cleared of the dense forest that now covers it. The western portion, however, of the Thames and Ohinemuri Counties contain large areas of alluvial and swamp lands, now in the hands of the Crown, but, through want of drainage, not yet available for settlement.

In the County of Tauranga, the clay lands extend from Te Aroha Mountain to Katikati entrance, changing, near Tauranga, to sandstone and black pumice soil of rich character, which improves towards Te Puke and Maketu, where the land is all good, and more or less volcanic. In Whakatane and Opotiki Counties there are very extensive swamps, of which large portions are drainable, and back from the coast seven miles or so are large areas of Crown lands, broken and forest-covered, opened ready for settlement. The soil is chiefly clay or light loam, with alluvial flats in the valleys, and all well watered. This kind of country extends to the boundary of the land district. The coastal lands are nearly all alluvial flats in a high state of cultivation, and the settlers mostly well-to-do.

Review of Soils: Uses and Returns.

Briefly to set forth the capabilities of the Crown lands in the district, it will suffice to say that north of the Bay of Islands and Hokianga the land is suitable

chiefly for two classes of persons—the gum-digger, and the fruit-grower or small farmer. The former has the range over large areas of Crown lands upon paying a small fee, and his earnings average from 5s. to 10s. a day. As for the latter, in and around Hokianga, with its 250 miles of water-frontage, almost anything can be grown. Oranges and lemons flourish side by side with all kinds of apples, pears, and plums. Wheat does fairly well, and maize gives a return of 50 to 60 bushels an acre. Sheep also thrive; and most of the lands, when properly grassed with artificial grasses, will carry two or three sheep to an acre, but ordinary rough-grassed lands only one and a half to two sheep per acre. The clearing of forest lands, ring-fencing and grassing them, will cost about £3 to £3 10s. per acre. The same remarks apply to the Bay of Islands and Whangarei, and to the country as far south as Auckland. Round about Whangarei district, and under similar conditions of culture, the average return for good agricultural or pastoral lands would be fully 12s. an acre per annum. South of Auckland, throughout the Waikato, Piako, Waipa, and Raglan Counties, and thence south to the district boundaries, the land is both agricultural and pastoral. All the cereals do well, wheat averaging 27 to 30 and up to 40 bushels per acre, and oats 26 bushels per acre. Potatoes average from 5 to 7 tons per acre. Dairy-farming is carried on, yielding (upon well-cultivated farms) a net profit of 15s. to 20s. an acre per annum; whilst sheep-farming yields a profit of from 5s. to 7s. 6d. a sheep per annum on very large estates; allowing for greater losses from disease, &c., the average return would still be 4s. per sheep. The cost of clearing fern and scrub is generally from 7s. to 10s. an acre, and laying down fern land by surface-sowing and harrowing, about 17s. an acre.

The seaward counties of Tauranga, Whakatane, and Opotiki are both agricultural and pastoral, growing wheat and maize alike to perfection. In fact, these counties, upon their alluvial shores and uplands, grow the greater portion of the maize produced in the district, and from the ports of Whakatane and Opotiki in one year some 34,000 sacks have been exported. In these counties the average yield of wheat is from 22 to 25 bushels per acre, oats about 29 bushels per acre, and maize 45 to 60 bushels per acre. It is quite possible within this district to select land early in the winter, fell and burn off by the ensuing summer, sow in grass in the autumn, and put on stock within twelve months from selection.

Rainfall.

The rainfall during the year averages about 39 in., the greater portion of which, as a rule, falls between the 1st of May and 1st of November, or during the winter and spring months. Owing to the constant changes of wind, caused by the configuration of the coast-line, the shortness of the distance between the two coasts, and the influence, greater or less, of the trade-winds, it is quite common for one neighbourhood to have double the rainfall of another, even though the two be only twenty miles apart. Droughts of more than a couple of months are practically unknown, and grass is always abundant.

Winds.

One of the chief means whereby the great healthiness of the climate is maintained is the constant presence of fine breezes, blowing both summer and winter, the prevailing winds being north-east and south-west, and very seldom passing into really heavy gales. In the middle of summer, the sea-breeze during the day and the land-breeze at night are almost unvarying.

Chief Centres and Surrounding Districts.

The City of Auckland lies on the southern shore of the Waitemata Harbour, one of the finest havens in the colony, on a narrow neck of land between the Waitemata and the Manukau. Alike from the sea and from the neighbouring hills the city and surrounding country present a charming picture. Especially fine is the view from Mount Eden, a low volcanic hill in the suburbs. Facing the town are the green hills and white houses of the North Shore, and the remarkable island peak of Rangitoto; beyond lie the many islands of the Hauraki Gulf, with the blue hills of Coromandel and the Great Barrier in the far distance. Clustered near the foot

of the hill, and scattered for many miles to the southward, are charming villa-like houses, with tasteful gardens and shrubberies, while to the north-west the view is closed by high wooded ranges. The city has an excellent commercial position; it has communication by sea with both sides of the Island, while the Kaipara and Wairoa Rivers leading far into the northern peninsula, and to the south the Waikato and Thames Rivers leading into the heart of the Island, give it natural facilities for inland communication. In March, 1901, the population of the city and suburbs amounted to 67,226 persons. The city is well supplied with gas and water, and amongst public buildings may be noticed Government House, the new Government Offices, Post and Telegraph Offices, Supreme Court, &c. There is a Free Public Library and Art Gallery, and a good Museum, containing what is probably the best Maori collection in the world. The Auckland University College is affiliated to the New Zealand University. The Victoria Arcade, the Exchange, Harbour Board Offices, hotels and clubs, as well as many commercial buildings, compare favourably with those in other parts of the colony. There are admirable recreation-grounds, including the Government Domain of about 180 acres, as well as the Botanic Garden and the Albert Park in the centre of the city. There is an electric tramway system extending through the suburbs. Auckland has numerous industries, including, amongst others, ship-building, sugar-refining, timber-converting, sash and door manufactories; rope and twine, pottery, brick and tile, and varnish works; printing-offices, &c.

The City of Auckland is the centre from which radiate all railways, road, and steamer routes. From it, by rail, lies the way to all Crown lands south of the Waitemata, while the Kaipara Railway connects it with the country north of Helensville. All lands to the north and along the Bay of Plenty are reached from its wharves by the Northern Company's steamers. The chief centres to the north are:—

Warkworth, on the East Coast, over forty miles from Auckland, with communication by coach and steamer nearly every day. It is a thriving township, with post and telegraph office, public halls, hotels, &c. It is also the site of important hydraulic-lime and cement works. A good deal of agricultural and pastoral farming is carried on in its neighbourhood.

On the West Coast an important centre is Helensville, on the Kaipara Harbour, distant thirty-eight miles from Auckland, with which it is connected by rail. It has all the conveniences required by travellers in the shape of good hotels, stores, &c., and is the starting-point of the river-steamers running to all places in the Otamatea and Hobson Counties. It is also one of the main centres for the export of balk timber.

North of Helensville the railway has been opened to Ahuroa, fifty-seven miles from Auckland. The line is under construction to Mahurangi, and will eventually be carried on to Maungaturoto.

Dargaville, on the Wairoa River, is a town of about 600 inhabitants, with all conveniences for travellers. It may be reached by rail and steamer from Auckland three times a week. Dargaville is the starting-point of the Kaihu Valley Railway, which is open for traffic for seventeen miles from the town, and from the terminus of the railway all the Crown lands in the neighbourhood are reached, even so far north as Hokianga. The town is also the centre of a very large timber-export trade. There are only two townships on the west of any importance north of Dargaville—Port Rawene, or Hokianga, and Kohukohu, about five miles further up. Both have post and telegraph stations, and comfortable hotels, with fortnightly steam-communication from Auckland.

Whangarei, on the East Coast, is distant ninety-five miles from Auckland, with which it has steam-communication three times a week. The town is a thriving and important place, having a population of about 1,700, and is the centre of a large agricultural and pastoral country. In the neighbourhood is also a large coal-bearing and gum-and-timber-producing district, while the export of oranges and lemons, which thrive magnificently on the rich volcanic soil, is on the increase. From here, all lands within a radius of thirty to forty miles may be visited by horse, carriage, or rail. Opau Wharf, about three miles south of Whangarei, is the present commencing point of the railway-line passing through Whangarei and Kamo to Hukerenui, a distance of about twenty-three miles. This line will ultimately join that now being

constructed in a southerly direction from Kawakawa. A bridge has just been built over the Whangarei River, in order that the railway may be extended from Opau Wharf to deep water at Grahamtown, three miles distant.

Kawakawa, at the head of the tidal portion of the river of the same name, is connected by a short railway-line with Opua, the calling-place of steamers from Auckland. Kawakawa possesses good inns. From it coaches run weekly to Hokianga and Hukerenui. It is the centre of a coal and gum industry, and a port of lading for those products. The old town of Russell is situated further down the bay, and has a good hotel, besides having a post and telegraph office. To Whangaroa, Mangonui, Awanui, Hohoura, and Parengarenga the Northern Company's steamers run every week. Whangaroa is famed for its exquisite scenery, and is the centre of a large timber and gum export trade. Mangonui is the starting-point and centre from which to visit, by carriage or horse, all the Crown lands in the Mangonui County.

South of Auckland, along the Waikato Railway, there are numerous townships of more or less importance, but no starting-point for Crown lands until Mercer is reached at a distance of forty-three miles. It is situated at the borders of what is known as the Waikato Country, upon the Waikato River, which is tidal up to this point, and the township has a post and telegraph office and other conveniences. At sixty-five miles from Auckland by rail is Huntly, also on the Waikato River, a flourishing township, with a large output of valuable coal. It has also pottery, brick, and tile works. On the opposite side of the Waikato River large areas of Crown lands are being brought into use, and are carrying numbers of sheep and cattle. The next town is Ngaruawahia, or Newcastle, seventy-four miles from Auckland, situated at the junction of the Waikato and Waipa Rivers, with hotels, bank, post and telegraph office. It is a centre from which portions of Crown lands in Raglan County are reached, and also from it river-steamers run north and south to the various settlements. Ngaruawahia has a flourishing creamery, a brewery, and a cooperage. At eighty-five miles from Auckland the train reaches Frankton Junction, where lines branch off to Hamilton, Cambridge, Te Aroha, Paeroa, Thames, and Rotorua, the main line going through Te Awamutu, 100 miles from Auckland, to Taumarunui, 175 miles. About two miles beyond Taumarunui the Wanganui River is crossed on a substantial steel bridge, which is available for both road and railway traffic. The rails are laid for a few miles beyond this bridge, but only material and goods trains are run at present, the passenger-trains making Taumarunui their terminus. The formation-work on the railway is being actively proceeded with towards Waimarino, the advance works now reaching to a distance of 190 miles from Auckland.

Waimarino (206 miles from Auckland) is the summit of the line, the height above sea-level here being 2,600 ft.

Te Awamutu is a thriving town, and is especially English-looking with its nicely cultivated fields and well-kept hedges Taumarunui is not only the temporary railway terminus, but is also the point where the Wanganui River traffic connects with the northern railway system, and is becoming in consequence of this a regular tourist resort. As the train reaches the town in the evening, and leaves for Auckland early on the following morning, travellers stay the night, and a very good accommodation-house exists for their convenience. Taumarunui is also an important Native centre.

Hamilton is a busy, flourishing town, situated on both sides of the Waikato River, with a population of about 1,400 persons, and is the centre of an agricultural and pastoral district. It possesses a creamery, flax-mill, brewery, and two soap-factories, besides other local industries. Cambridge, about thirteen miles by road and fifteen miles by rail from Hamilton, has a population of about 1,200, and is the headquarters of the Farmers' Club. It is a busy, thriving township, surrounded by good farming country. Between Hamilton and Cambridge, and in the country round, there are numerous creameries, cheese and butter factories. Wine and cider making is also successfully pursued, and there are several apiaries, from which large quantities of honey are produced. There are three flour-mills in the district, one at Cambridge, one at Hamilton, and the third at the terminus of one of the

before-mentioned branch lines. One hundred and fifteen miles from Auckland by rail is Te Aroha, a quiet township, celebrated for its thermal springs, with good hotels. Another thirteen miles brings the traveller to Paeroa, a centre of mining industry, whence a branch line 12½ miles long is under construction to Waihi, a gold-mining town, and in another twenty miles the Thames Borough is reached.

The settlements at the Thames and Coromandel are essentially mining townships. The first is situated forty-two miles by steamer from Auckland, on the Firth of Thames, and at the mouth of the Waihou River. It has a population of about 4,000 persons. There is daily rail and steam communication with Auckland, the railway also connecting it with Paeroa and Te Aroha. Coromandel is about thirty-five miles from Auckland, with which it has constant communication by steamer; it is another mining centre, situated at the head of a picturesque harbour. Tauranga, with a population of about 1,200, is situated on the harbour of that name in the Bay of Plenty. Coaches run thither from the Thames, and from Rotorua; it has also constant communication by steamer with Auckland, and with Matata, Whakatane, and Opotiki. From the fact of the harbour being the only one on the East Coast between Coromandel Peninsula and Gisborne capable of receiving large vessels, the town is bound to be of importance in the future.

Opotiki, the second town of importance in the Bay of Plenty, is situated about eighty miles by steamer or road from Tauranga. It has steam communication with Auckland, and is connected with Gisborne by means of bridle-track, road, and railway. It is the headquarters of the maize-producing district, and has rich alluvial lands, from which good returns are obtained. It is a starting-point from which large blocks of Crown lands suitable for pastoral purposes may be reached.

The Township of Rotorua is situated on the shores of Rotorua Lake, at a distance of 171 miles by rail from Auckland. Travellers can reach Rotorua in one day from Auckland. It is the chief township in the hot-lakes district, and has also a large area of fairly good Crown land near, adapted for pastoral purposes. Considerable quantities of sulphur are obtained from the neighbourhood.

Crown Lands available for Immediate Settlement (1,014,266 *Acres*).

Surveyed rural land	125,850	acres in 663 sections.
Unsurveyed rural land	303,089	,,
Lease in perpetuity under Land for Settlements Acts	7,721	,, in 280 sections.
Village settlement, lease in perpetuity	9	,, in 5 sections.
Pastoral runs	261,849	,, in 11 runs.
Small grazing-runs	61,051	,, in 10 runs.
Hauraki pastoral leases	254,697	,,

		Acres.
Bay of Islands County ...	58 sections, including 1,394 acres unsurveyed land	8,773
Coromandel ,, ...	3 sections, including 7,626 acres unsurveyed land	8,442
,, ,, ...	Hauraki pastoral leases	72,849
East Taupo ,, ..	14,076 acres unsurveyed land ...	14,076
,, ,, ...	7 pastoral runs	204,801
,, ,, ...	2 small grazing-runs	19,288
Hobson ,, ..	11 sections, including 2,154 acres unsurveyed land	3,051
Hokianga ,, ...	97 sections, including 10,472 acres unsurveyed land	26,494
Kawhia ,, ...	29 sections, including 4,590 acres unsurveyed land	27,560
,, ,, ...	5 sections (Te Kuiti Village Settlement)	9

			Acres.
Manukau	County ...	10 sections, including 2,695 acres unsurveyed land	3,526
Mangonui	,, ...	75 sections, including 12,179 acres unsurveyed land	26,387
Ohinemuri	,, ...	36 sections	12,958
,,	,, ...	Hauraki pastoral leases	67,998
Opotiki	,, ...	30 sections, including 113,195 acres unsurveyed land	115,281
Otamatea	,, ...	8 sections	163
Piako	,, ...	47 sections, including 3,206 acres unsurveyed land	6,583
Raglan	,, ...	8 sections, including 1,815 acres unsurveyed land	3,275
Rodney	,, ...	25 sections, including 230 acres unsurveyed land	2,223
Rotorua	,, ...	7 sections, including 12,020 acres unsurveyed land	15,044
,,	,, ...	2 pastoral runs	25,360
Tauranga	,, ...	29 sections, including 12,926 acres unsurveyed land	17,154
Thames	,, ...	7 sections, including 1,970 acres unsurveyed land	4,838
,,	,, ...	Hauraki pastoral leases	113,850
Whangarei	,, ...	64 sections, including 2,241 acres unsurveyed land	7,419
Waikato	,, ...	32 sections, including 6,016 acres unsurveyed land	26,390
,,	,, ...	2 small grazing-runs	6,386
Waipa	,, ...	2 sections	25
Waitemata	,, ...	49 sections, including 400 acres unsurveyed land	4,588
Whangaroa	,, ...	14 sections, including 1,207 acres unsurveyed land	3,362
Whakatane	,, ...	6 sections, including 34,757 acres unsurveyed land	35,263
,,	,, ...	1 pastoral run	17,413
,,	,, ...	1 small grazing-run	5,232
West Taupo	,, ...	8 sections, including 42,209 acres unsurveyed land	53,959
,,	,, ...	1 pastoral run	14,275
,,	,, ...	5 small grazing-runs	30,145
No county	... ...	8 sections, including 1,351 acres unsurveyed land	2,096
		Total	1,006,545

Under Land for Settlements Acts.

		Acres.
Eden County	28 sections	59
Otamatea County ...	22 sections	6,532
Piako ,, ...	1 section	325
Waitemata ,, ...	212 sections	786
Whakatane ,, ...	16 sections	12
,, ,, ...	1 section	7
	Total	7,721
	Grand total	1,014,266

Timber.

The extensive forests in the Auckland District contain many timbers of which the durability and strength are of established reputation. Of these the kauri, which is indigenous to the district, is greatly valued. The trees often attain gigantic size, and the vast groves create a profound impression upon those who view them for the first time. There is great demand for kauri timber, but rimu (red-pine), kahikatea (white-pine), and totara are also much used for building and other purposes. Most of the timber is disposed of in New Zealand, but during the year ended the 31st December, 1903, 54,493,610 ft. of hewn or sawn timber, valued at £236,012, were shipped for export at Auckland and Kaipara.

Recently compiled returns furnish the information that there are in the Auckland District 64 sawmills, employing 1,845 hands; but the number of persons engaged in bushfelling and other occupations in connection with the timber industry must be approximately between four and five thousand. The aggregate cutting-capacity of the mills is about 275,000,000 ft. per annum, but the average annual output is about 197,000,000 ft. The balk timber is brought by rail or along the coast to Auckland, where it is sawn into various sizes. Several large mills and wood-working establishments have been erected in the city, and also for a considerable distance along the harbour frontage.

With the view to preserving specimens of the various timbers and clumps of forest for scenic purposes, the Government have made extensive reserves in various parts of the district. In addition, State-appointed experts are engaged in planting forest-trees, and in nurturing and cultivating young trees.

Kauri-gum.

A good demand continues to exist for this unique product, which is found in the Auckland District only. During 1903 large consignments, totalling 9,357 tons and valued at £631,102, were disposed of in America, the United Kingdom, and other parts of Europe, where it is manufactured into varnish of the finest quality.

A proportion of the gum is also utilised in this colony for the same purpose, and altogether about a hundred persons are engaged in the manufacture of varnish, 90 per cent. of which is disposed of locally.

In the manufacture of varnish kauri-gum is said to have an advantage over even the best Manila copal, inasmuch that in its use uniformity of quality may be anticipated with a greater degree of certainty.

The gum industry affords employment for several thousand men, who are engaged in digging, scraping, sorting, and packing it for export.

In its original state, being of a viscid nature, it exudes from various parts of the trees, and finally reaches the ground, where it solidifies and becomes a hard yet brittle substance.

The principal method of obtaining it is as follows: Where the land has been denuded of kauri-trees, a long rod or spear is used in penetrating the ground to a depth varying from 12 in. to 30 in., according to the nature of the soil.

When the existence of gum has been ascertained the soil is turned over and the deposits unearthed. These are of different quality, that of an amber-like transparency being of the highest value.

A few years ago it was thought that the supply would soon become exhausted, but a competent authority of long experience advances the opinion that large quantities of gum will be obtainable for a considerable period, as deposits are continually being found at greater depths than formerly, and in localities where it was believed that the gum was completely worked out.

It might be supposed that kauri-gum which had been covered by earth for many years would have in consequence deteriorated, but such is not the case unless the soil be wet. New gum contains a chemical property which proves troublesome to the manufacturers of varnish, whilst that which has been imbedded for a lengthy period does not possess this defect.

It has been observed that kauri-trees flourish best on high ground, but large quantities of gum are found in swampy land where the face of nature appears to have undergone a change through seismic disturbance.

The value of swamp-gum is generally low in comparison with that of gum obtained at higher elevations; and, indeed, in some instances huge deposits are found in the swamps which are of no commercial value.

Recently the Government permitted an experiment to be made in the matter of procuring kauri-gum by tapping a few trees in an isolated district; but until it has been definitely ascertained that the trees are not injured in consequence the further tapping of trees is regarded as an illegal act. It is quite possible that the experiment, which is being carried out scientifically, may be thoroughly satisfactory, and the risk of damage to the kauri-trees so minimised as to justify their preservation for the purpose of cultivating a new industry, in which case the present milling operations would be so revolutionised as to centre attention on many valuable timbers that have hitherto been overlooked to a great extent in the desire to obtain kauri.

Flax (Phormium Tenax).

At a very remote period in the history of New Zealand the value of this excellent product, which is found in abundance, was recognised, and long before machinery was introduced by Europeans the Natives possessed a method of successfully treating it.

Not only were they able to use the flax in making mats and comfortable Native clothing for themselves, but they produced it in large quantities for disposal to the early traders and whalers, who turned the investment to profitable account in the market of the New South Wales capital.

For many years past much attention has been devoted to the dressing of flax by improved methods, and the Government have from time to time greatly encouraged manufacturers by offering a substantial bonus for the production of fibre of a high-grade quality.

Throughout this district numerous flax-mills are in operation. These employ a large number of people, whilst in the City of Auckland some forty-one hands are engaged in making rope, twine, and cordage. The manufactured articles are of a quality which bear favourable comparison with those imported into the colony.

Last year the quantity of flax exported was 4,917 tons, valued at £128,280.

Gold and Silver.

For many years past large quantities of gold have been obtained in this district, the auriferous-quartz reefs being principally located in the Thames, Coromandel, Ohinemuri, and Piako Counties. The method usually adopted in the treatment of the ores is by the cyanide process and battery amalgamation.

During last year there was a substantial increase in the gold-output as compared with that of the previous year. In 1902 the quantity yielded was 201,390 oz., valued at £721,974, whilst 1903 produced 232,682 oz., of the value of £832,334, being an increase of 31,292 oz. and £110,360 on the former year's figures. The value of 911,914 oz. of silver exported from Auckland last year amounted to £91,497.

Considerable interest continues to be taken in the School of Mines at the Thames, where the instruction imparted is keenly appreciated.

Many experienced prospectors are still engaged in exploring other parts of the district where auriferous reefs are known to exist; whilst the future of some of the smaller claims which have been pegged off is anticipated with much hopefulness.

The famous Waihi Mine, situated in the Ohinemuri County, steadily maintains its reputation as one of the largest gold-producers in the world. This mine employs some seven hundred men. The quantity of ore treated during 1903 was 231,323 tons (dry weight), the bullion realising £658,393. The total value of bullion yielded since the company commenced operations amounts to the large sum of £3,161,298, and dividends amounting to £1,255,143 have been distributed amongst shareholders, this being exclusive of £77,489 paid as income-tax. As the auriferous-quartz reefs are very extensive in character, it is reasonable to predict that immense quantities of ore will be treated for many years to come with equally satisfactory results. The Town of Waihi contains a population of about 4,500, and may be reached by either steamer to the Thames, thence by rail to Paeroa, thence by coach: or by rail from Auckland to Paeroa, thence fourteen miles by coach to destination. The whole distance between Auckland and Waihi will shortly be connected by rail, as the work of further railway extension is being proceeded with. The time occupied in visiting Waihi and returning to Auckland is two days.

Coal.

In various parts of this district extensive coal-deposits exist, and mining operations are successfully carried on in the north at Hikurangi, Kamo, and Ngunguru, whilst in the south the coal-mines at Huntly and Taupiri continue to supply a household coal of fine quality. The annual output of these mines is about 190,000 tons, most of which is consumed locally.

The City and Suburbs of Auckland are principally lighted by coal-gas, and about 36,000 tons is utilised annually for its manufacture. This is brought from Westport, in the South Island, where a specially suitable coal is obtainable in large quantities.

The value of 15,659 tons of coal exported from Auckland during 1903 was £18,334.

Wool.

This industry does not reach a maximum of importance in this district as compared with other parts of the colony, the attention of the settlers being chiefly centred in the dairying industry. At the same time a considerable quantity of wool is produced for export and local use. The product is usually of excellent quality, and when properly graded brings the highest market prices.

The quantity of wool shipped from the Auckland District during 1903 was 7,513,316 lb., the value being £166,886, an increase of 234,961 lb. and £27,810 over the figures of 1902.

As the forest lands become denuded larger areas will be available for sheep-grazing. This will no doubt result in the wool industry being found within a few years in the front rank of importance.

Dairying.

Some idea of the prosperous condition of this industry may be arrived at from the fact that no less than 41,447 cwt. of butter, valued at £195,433, and 215 cwt. of cheese, valued at £683, were shipped from the port of Auckland to the United Kingdom and elsewhere during the year 1903.

Distributed over this district are numerous factories and creameries, employing a large number of hands, who are periodically instructed by

experts appointed by the Government as to the most improved methods of dealing with the manufacture of cheese and butter. Under these circumstances it can be easily understood that the industry is yearly increasing in importance, inasmuch as large quantities of these commodities are being produced of a high standard of excellence.

Fisheries.

At present about 180 boats of various sizes are engaged in the fishing industry, employment being thus found for several hundred people.

There is great abundance and variety of edible fish, and a steady supply for the market is maintained, consisting principally of snapper, mullet, and flounders. Whitebait are also supplied from the Waikato River during the months of August, September, October, and November.

A small quantity of cured fish is exported to Sydney, and the canning of mullet for local consumption and export affords employment to a large number of people.

There is good trout-fishing to be obtained in many of the rivers and streams of the district, notably those at Okoroire, Rotorua, Atiamuri, and Galatea.

Numerous beds of rock-oysters exist on both coasts, but during part of the year this fishery is closed. Large numbers of oysters are exported during the open season to other New Zealand ports, besides a small quantity to Australia.

Fruit-canning and Preserving.

The soil and climate of Auckland are particularly adapted to fruit-growing, and during the season the supply is so abundant that in many instances it barely pays the producer to send it to the local market. The increased interest in the business of canning is mainly due to this fact, and already the prospects of the industry are good, as canned fruits may now be obtained equal in quality to those imported from California and elsewhere.

At the Thames and in parts of the Waikato gooseberries and apricots do well. Peaches grow splendidly in most parts of Auckland, and within a few years large quantities should be available for canning purposes. Apples, plums, and strawberries of fine flavour grow abundantly, and the former, when carefully packed, always command good prices. Evaporated fruits are also disposed of to advantage.

Fruit-growers are now recognising the importance of the canning industry, and are being encouraged under the supervision of Government experts to cultivate fruits especially suitable for canning. There are five firms in this district engaged in the business, and employment is found for about seventy hands. A number of fruit-growers are also canning fruits in a small way in various parts of Auckland with more or less success.

General.

Auckland, on account of its remarkably fine harbour and first-class shipping facilities, possesses many local industries, all of which are in a most flourishing condition.

Perhaps first in importance is the Colonial Sugar Company's refinery at Chelsea, where some 250 hands are constantly employed. The extensive machinery for the treatment of the raw material which is brought from Fiji is capable of turning out 1,000 tons of refined sugar weekly. Most of the output is consumed in the colony, but a proportion is shipped to the New Zealand dependencies and elsewhere. Last year the value of sugar exported was £5,448.

Amongst the more recently established industries are the paper-mills at Riverhead, on the upper reaches of the Waitemata. These mills employ some thirty-one hands, whilst the quality of the paper manufactured is first-class.

The brick and pottery business affords occupation for about 220 people, and there is every prospect of this number being increased shortly, as, in consequence of the extension of the electric tramways to various parts of the suburbs, a much larger demand for building material exists.

In the north and on the shores of one of the best harbours in the colony (Whangarei) an immense deposit of kaolin has been found. Various tests have proved the quality exceptionally good and in every way suitable for the manufacture of china, crockery, vitrified drain-pipes, tiles, &c.

Within easy distance of Auckland large hydraulic lime and Portland cement works are in full operation, the annual output being from 25,000 to 30,000 tons. These works employ about 120 hands. The quality of the lime and cement is such that it is used in connection with important public works. Over 8,000 tons of cement have been used in the construction of the breakwater at New Plymouth, and it has given entire satisfaction.

The Onehunga woollen-mills employ ninety hands in the manufacture of blankets, tweeds, and other woollen goods. These compare favourably with anything of the kind imported.

Besides the industries mentioned, many others equally successful are in operation, including meat-preserving works, flour-mills, oil, soap, and candle works, boot and shoe factories, tanneries, ironworks, shipbuilding-yards, large printing and lithographic works, &c.

The Electric Tramway Company employs some 340 hands, and maintains a huge plant. During the year 1903 no less than 13 million tickets were issued to passengers. Since the inauguration of the electric-car service the congested portion of the population of the city has been greatly relieved, as large numbers of people have removed to suburban houses which have been recently erected at an almost extraordinary rate. Auckland may now claim to be one of the most progressive cities in the colonies.

The exports of colonial produce from this port last year amounted in value to £2,501,605.

THE TARANAKI LAND DISTRICT.

F. Simpson, Chief Surveyor.

The Taranaki Land District is situated on the western side of the North Island of New Zealand, at about its widest part, and may be said to be the most compact and fertile district of the colony, for, with the exception of the upper half of Mount Egmont, and of the ranges adjoining, which absorb about 36,000 acres, the whole of the area—minus what is taken up by the rivers, streams, and lakes—is suitable for settlement, and certainly two-thirds of the district is good land. The gross area of the district is 2,430,000 acres.

Physical Features.

Of mountains, the principal one is the beautiful volcanic cone from which the district takes its name, Taranaki, otherwise called Mount Egmont, which has an altitude of 8,260 ft. This mountain is the centre of distribution for a radius of twenty miles of the volcanic formation known as the "drift," which covers the volcanic rocks below an altitude of 3,000 ft. Hummocks composed of trachyte boulders and cement crop up here and there and make excellent metal-quarries.

Beyond the volcanic ormation—that is, from about Urenui on the north and Hawera on the south—the country is generally broken, and the formation is known as papa, a calcareous blue clay, capped in many places by shelly limestone.

The northern portion, between the Tongaporutu and the Mokau Rivers, contains also limestone, greensands, and coal outcrops. At Panirau, a small tributary of the Mokau, about thirty miles from the sea, there is an isolated patch of volcanic agglomerate and tufas, and a similar formation is found at the north-eastern corner of the district.

Eastward of the base of Mount Egmont there are few, if any, mountains worthy of the name, although there are many ranges varying in height from 1,000 ft. to 1,500 ft. above sea-level, and, in a few instances—such as the Matemateonga and Waiaria Ranges—they run up to 2,500 ft.

The principal river is the Wanganui, which bounds the district on the east between Taumarunui and Pipiriki, a distance of about ninety miles. Its average width varies from 2 to 3 chains. For nearly the whole distance it is shut in by high precipitous hills, and in many places by perpendicular walls of rock. The scenery is very grand and beautiful. There are numerous rapids, but few of them are dangerous to skilful canoeists. Steamers run regularly from Wanganui to Pipiriki, a distance of fifty-five miles.

Messrs. Hatrick and Co. are running a steamer between Pipiriki and Putikituna, some twelve miles up the Tangarakau River. From this point a road (nine miles in length) has been constructed to join the Ohura (or East) Road at a point about forty-seven miles from Stratford, and in the middle of the Whangamomona Improved-farm Settlement, the settlers in which and surrounding blocks will thus have double communication, with Wanganui on the one hand and Stratford on the other. When the road is completed through to Auckland, tourists can enjoy a trip up the Wanganui River as far as Ohura, then back, and up Tangarakau River across to Ohura Road, then on to Auckland, or back to Stratford, as they desire. The dimensions of the steamer are 40 ft. long by 8 ft. beam, with a light draft of 9 in. and passenger capacity for forty, the amount of cargo depending on quantity of water in river from time to time. The time-table as at present arranged is: Leave Putikituna for Pipiriki and Wanganui every Tuesday morning at 10 o'clock, and every Sunday leave Pipiriki for Putikituna. The principal tributaries flowing into the Wanganui on the Taranaki side are the Whangamomona, at eighty-two miles; Tangarakau, at eighty-five miles; Ohura, at 114 miles; Ongaruhe, at 143 miles respectively from the Town of Wanganui.

The next river in size is the Mokau, bounding the district on the north. It is navigable for handy steamers drawing from 7 ft. to 8 ft. of water as far as the coal-mines, about twenty miles from its mouth, and for canoes as far as Totoro, twenty-six miles further up. Several outcrops of coal are found on its banks, and, as limestone is also present, the river is likely to become an important waterway of the district. The scenery on either side, although not on quite so grand a scale as may be seen on the Wanganui, is very beautiful.

The other large rivers are the Waitara and Patea. The former has its source about midway between the coast and the Wanganui River, in an easterly direction from Puksaruhe, between New Plymouth and the Mokau. It is about a hundred miles in length, and runs out at the Town of Waitara, some ten miles north-east from New Plymouth. There is a bar at the mouth, but steamers of 300 tons can enter safely in calm weather, and, although there are numerous rapids on its course, it is navigable for canoes for about ninety miles.

The Patea River rises in Mount Egmont, and, after traversing a tortuous course of about 110 miles, runs out at the extreme southern end of the provincial district. It has a bar-harbour, with a depth of 13 ft. to 14 ft. at spring-tides. Steamers of from 40 tons to 50 tons trade regularly to the town of Patea, which is situated a mile or so north of the mouth. The Patea is navigable for canoes for fifty miles.

Besides these rivers there are many smaller ones, and streams innumerable—in fact, no district in the world could be better watered and at the same time be so

secure from disastrous floods. It is estimated that between the Mokau and the Patea there are no fewer than eighty-five named streams emptying themselves into the Tasman Sea, fully sixty of which flow from Mount Egmont.

Excepting the Ngaire Swamp, a block of open land near Eltham, 3,700 acres in extent, now partially drained and recently disposed of for settlement purposes, there are no plains, properly so called, in the district, although the stretch of very fertile country lying between the Waingongoro and Otakeho Rivers, comprising an area of about 25,000 acres, is known as the Waimate Plains. Of this area 13,500 acres have been disposed of, and the remainder, 11,500 acres, has been handed back to the Natives as a reserve.

There are no lakes worthy of the name. The largest sheet of water is Rotokare, situate about twelve miles from Eltham; it is about half a mile in length, with an average width of six chains. There are also a few small lakes inland from Waverley, at the southern end of the district.

The whole of the district, with the exception of a fringe of open country along the coast from Pukearuhe to Patea, averaging three miles in width, and containing about 250,000 acres, and some valleys at the north-eastern corner of the district, about 150,000 acres in extent, was originally covered with heavy forest, but this is rapidly disappearing under progress of settlement and erection of sawmills to deal with such timber.

The larger timber is chiefly rata, rimu, matai, tawa, kahikatea, kohekohe, pukatea, rewarewa, hinau, with a few totara scattered here and there. Among the smaller trees may be mentioned the kotukutuku or fuchsia, karaka, and mahoe.

As regards the timber industry, there are altogether forty sawmills, and the total quantity cut during the year ended the 31st March, 1904, was 22,100,000 ft., chiefly rimu, 17,426,000 ft.; kahikatea, 4,397,600 ft.; totara, 88,200 ft.; and matai, 88,200 ft. Most of these mills work together under Association rules and prices, their output for the year being 12,495,553 superficial feet. The others work independently, and their output amounted to 9,604,447 ft. for the same period.

An area of 72,565 acres, measuring six miles on every side from the summit of Mount Egmont, was originally set apart as a forest-reserve. To this has now been added 1,040 acres on the lower slopes of Pouakai Range, with an additional 5,500 acres on the Patua Range, making a total of about 79,000 acres, which has now by Act of Parliament been set apart as the "Egmont National Park," the internal affairs of which are administered by a partly elected and partly nominated Board of ten members. At about three miles within the reserve the forest begins to get stunted; and at four and a half miles it gives place to low wiry scrub, which ceases at five miles, or an elevation of about 4,000 ft. At 5,000 ft. the moss ends; beyond this point to the summit the mountain is composed of loose scoria and lava.

A comfortable house, known as the Egmont Mountain-house, has been built at an elevation of 3,200 ft. on the northern face of the mountain, at a distance of twenty miles from New Plymouth by the Junction and Egmont Roads. Eighteen miles can be driven over, and the remaining two ridden. This house is maintained by the Egmont National Park Board, and is open for the accommodation of visitors from about the 20th of December to the middle or end of April in each year. The keeper acts as guide also. The time usually occupied in the ascent from the house is from three to four hours for men, and four to six hours for ladies. There are two women's rooms at one end of the house, and two men's at the other, with large common living and dining room in the centre. Visitors have now the option of being supplied with meals at a cost of 1s. 6d. each, or they may provide and cook their own food. Horse feeds, 1s. 6d. each; paddocking, 6d. daily, or 2s. 6d. a week. A small charge for use of house is made to visitors of 1s. per night or 5s. per week throughout the visit. In addition to the mountain-house, the Board has erected a cottage of three rooms, comprising two bedrooms (fitted with four bunks each), and one living room in between. This cottage is intended for renting by the week to family parties, only one such party occupying it at a time, the minimum charge per week being two pounds sterling for a party of four adults; over that number and up to eight (the limit allowed), 7s. 6d. each per week; children over five and under

twelve years, half rates. The cottage is not let to any one party for a longer period than two weeks while there are other applicants. The Board provides cooking and other utensils, firewood, and water, also mattresses and pillows; but visitors must take their own blankets, and provide and cook their own food. The caretaker at the mountain-house keeps a small stock of the principal lines of food usually wanted for sale to visitors. The cottage is within 60 or 70 yards of the mountain-house, and in charge of the same caretaker, but parties desirous of renting it should communicate with the Honorary Secretary to Committee for Northern Division of Egmont National Park, New Plymouth, giving dates between which they require it. These applications are booked in order of priority of receipt (after notification that offers will be received, usually in the early part of December). The cottage is opened and closed on same dates as the mountain-house. Guide's fee for mountain, £1 per party. During the past season there were 1,116 visitors, remaining various periods of from one or two days to as many weeks. The view from the top is superb, including as it does, volcanic cones of Ruapehu, Ngauruhoe, and Tongariro, the whole of Taranaki, and a considerable portion of Auckland and Wellington Districts, also across Cook Strait to the mountains of Marlborough and Nelson Districts of the Middle Island. In fine weather, when the snow is off, the mountain can be ascended without risk. A considerable sum has been expended in improving the accommodation at the house.

The mountain can also easily be ascended from Stratford side, the return journey occupying about thirteen hours, including stoppages. Tourists can ride over the first eleven miles to the Pembroke Road Mountain-house (three rooms) above the bush-line, altitude 3,720 ft.: time occupied, about two and a half hours. A new two-roomed cottage has been erected, and is now in use. Here the horses are left, and the remaining climb has to be done on foot: time required for a fair walker, three hours, although, coming down, the distance can be done in two hours. Three hundred persons visited the mountain by this route during the season. Good hotel-accommodation, guide, and horses can be obtained in Stratford. Provisions are kept on reasonable terms by the caretaker at the house. The return trip can be varied by visiting Dawson's Falls and Kendle's Cascade, or by a run across to the Egmont Mountain-house. Those who do not care to attempt the summit will be amply repaid by the pleasure of the ride through the forest, and by the magnificent views to be obtained from the house. The houses have sleeping-accommodation for about thirty persons.

Another route now coming into favour is from Hawera or Eltham *viâ* Manaia or Kaponga and Dawson's Falls. At the latter place a comfortable shelter-house, capable of accommodating over forty people, has been erected, and is known as the Falls Mountain-house (altitude, 2,990 ft.). This house, which is close to the Falls (65 ft.), is within an easy two hours' ride of Kaponga. During the season the house is in charge of a caretaker, and food, horse-feed, and paddocking can be obtained. There were 1,236 visitors to Falls and mountain by this route during last season. A comfortable three-roomed cottage has been erected in connection with this house. Water is obtained from the adjoining creek by means of a ram. From the house to summit of Mount Egmont occupies from four to six hours' climbing at a moderate pace, the time being in accordance with strength and composition of party. From the top the tourist can, instead of returning by the same route, drop down to the mountain-house on the north or New Plymouth side of the mountain. The walk would not occupy over two hours, easy walking, or he could go out *viâ* Stratford.

Recently a track has been partly made from the western side of the mountain, enabling 100 tourists to ascend *via* Rahotu. A small accommodation-house has been erected, 32 ft. by 14 ft., consisting of a general room and two sleeping-rooms, each containing twelve bunks. Tables, forms, and utensils have also been provided.

Soils.

The volcanic soil, the boundaries of which have been already described, varies a good deal in quality. The best is believed to be on the south side of the mountain, between Stratford, Hawera, and Opunake, but not less than two or three

miles from the forest-reserve boundary. It is thought that the country now being opened to the north and east of the volcanic deposit—that is, the papa and limestone formation—will, from the presence of lime, be much richer and more lasting as pasture-land than that around the mountain. The carrying-capacity of the land is, on an average, two and a half to three sheep to the acre.

Dairying, Grazing, and Agriculture.

Taranaki is essentially a grazing and dairying district, its chief products being butter and cheese.

There are 91 dairy factories and 71 skimming stations scattered over the district. Of these factories, 76 produce butter only, 9 butter and cheese combined, while 6 produce cheese only. Forty-four factories are owned by proprietory companies, while 47 are run on co-operative principles. There are also in this district 14 registered packing-houses for milled butter, more than 200 registered private dairies for butter-making, and 2 for cheese only, besides many small plants run on individual farms of which no record is obtainable.

In September, 1896, a new work in connection with the dairying and meat industries was started in the shape of the Taranaki Freezing-works, situated at Moturoa, near the breakwater, and close alongside the railway-line. During the year 1903 the output from the works was—Butter, 156,820 packages, weighing 3,920½ tons net; cheese, 14,955 packages, net weight 1,001½ tons. During the hot season the factories and railway-vans carrying butter have been supplied with ice from the works at a nominal cost. The district has sustained a loss this season through these works being burnt down, but, luckily, the most of the season's butter and cheese had been shipped. This set-back has not deterred the company, and plans are now prepared and everything in readiness to build the works anew in time for next season's output. Most of the butter from the southern end of the district now goes to Patea.

There are in the Taranaki District 20,207 horses, 259,129 cattle, 436,851 sheep, and 26,586 swine. These figures include all kinds and ages.

Agriculture has not hitherto been carried on to any great extent in this district. The total area under corn-crops and cut for threshing during season 1903–1904 was 7,263 acres; corn and grass crops cut for hay, chaff, or ensilage, 15,129 acres; corn and green crops for feeding to, or down with, stock, 1,036 acres; sown grasses and clovers for feeding down, 812,974 acres; sown grasses for seed, 511 acres; potatoes, 1,401 acres; beet, 2 acres; turnips, 9,930 acres; mangolds, 680 acres; rape, 1,888 acres; carrots, 542 acres; other crops, 80 acres; total area under crops of all kinds, including gardens, orchards, vineyards, 853,237 acres. Plantations, 1,047 acres; fallow, 471 acres.

The average yield of different grain-crops in bushels per acre for season of 1903–1904 was: Wheat, 30·43; oats, 24·0; barley, 28·0.

Mining.

The only mining going on at present is at the Mokau Coal-mines, which are situated on the Mokau River, about twenty-three miles from the sea, the river being navigable right up to the mines for vessels of 7 ft. 6 in. draught. The coal is the best class of pitch-brown, and is excellent for household and steam purposes.

Ironsand is found in great abundance on the seashore from Mokau to Patea, a distance of 130 miles. It produces, when smelted, from 50 to 60 per cent. of iron of the finest quality. The first attempt to smelt this sand was made in 1848, and several trials have been made since, but the heavy cost of production and the absence of capital and modern appliances have, so far, retarded the industry. Strong efforts are now being made to remedy this by the introduction of outside capital, and it is hoped these will shortly be successful, and work in full swing.

Petroleum Boring.

Another attempt at boring near the Breakwater is in progress.

Climate.

The climate of Taranaki is remarkably healthy, without any extremes of temperature. Below is given a table of mean, maximum, and minimum temperatures in shade for each month of the year ending December, 1903:—

	Jan.	Feb.	Mar.	April.	May.	June.	July.	Aug.	Sept.	Oct.	Nov.	Dec.
Mean temperature	66	64·6	64·8	62	57·6	52·5	53·5	55·7	60·1	60·9	64·8	64
Extreme maximum temperature ...	84	83	83	83	78	72	74	80	83	82	84	82
Extreme minimum temperature ...	36	41	38	40	35	33	32	32	36	42	36	51
Number of days on which rain fell ...	27	17	17	20	19	21	23	26	20	16	18	17
Total rainfall per month in inches and decimals ...	6·08	3·69	2·69	4·13	17·78	3·77	5·40	6·97	3·78	3·80	7·31	3·76
Mean barometric reading for the month	30·010	30·201	30·19	30·049	30·003	30·026	30·004	29·967	29·951	30·250	30·03	29·94

The mean barometric reading was 30·051 in. for the year. Total rainfall, 69·165 in. on 241 days. The rainfall varies considerably, as, for instance, at Norfolk Road, three miles south of Inglewood, the rainfall for the year 1903 was 112·77 in. on 199 days, the maximum falls being 4·24 in. and 4·25 in. on 12th and 13th May respectively. The average rainfall at New Plymouth during the past nine years was 62·540 in., and at Norfolk Road for same period 100·072 in.

Chief Towns.

The principal town of the district is New Plymouth (population about 5,000), situate on the seashore, about two miles from and to the north-east of the picturesque rocky islets known as the Sugar Loaves. The general appearance of the town is very attractive, and it abounds in neatly-kept gardens. The Recreation Grounds, from which a good view of Mount Egmont is obtained, form a favourite resort.

New Plymouth is 251 miles by rail from Wellington, the railway running in a northerly direction through the district from Patea to Sentry Hill, where it turns at right-angles westward for eight miles to New Plymouth. From Sentry Hill there is a branch line to Waitara, four miles distant.

The Port of New Plymouth is situated at the Sugar Loaves, two miles from the town. Protection for shipping is afforded by a concrete mole or breakwater running in a north-east direction for a distance of 1,900 ft. Under the lee of this there is wharf-accommodation provided for the coastal trade. Steamers of 1,000 tons can be berthed here in almost all weathers. The wharf is connected with New Plymouth by both rail and road. The breakwater was built at a cost of £200,000, borrowed under security of one-fourth of the land revenue of the Provincial District of Taranaki, and the right to levy a rate over certain lands. The present rate levied is ¼d. in the pound on the capital value. The principal over-sea exports from breakwater for the year (exclusive of all coastal trade) were: Bacon and hams, 261 cwt., value £988; butter, 72,730 cwt., value £337,455; cheese, 18,435 cwt., value £50,955; fungus, 1,008 cwt., value £1,937; leather, 127 cwt., value £621; tallow, 12 tons, value, £268; wool, 116,625 lb., value £2,173; hides, 3,525, value £392; total value, £398,737. Imports (oversea): value, £99,762. Customs duties for the year, £29,554.

Manufactures in New Plymouth are represented by a sash-and-door, a boot, butter-keg, and three coach factories, a brewery, a cordial factory, a flour-mill, tannery, fellmongery, bone-mill, and iron-foundry, with freezing-works and bacon-factory in the suburbs. The town has both water and gas laid on.

Hawera, the next largest town, is situate on the eastern edge of the Waimate Plains. The population is 2,500, and the town is lit with electric light and gas. The Wellington–New Plymouth Railway runs close to it, the distance by rail from New Plymouth being about forty-eight miles. Hawera is surrounded by a first-class dairying and grazing country, capable of carrying a very large population.

On 1st December, 1898, an up-to-date bacon-factory, costing some £1,200, commenced the work of killing and curing in Hawera, last season's output being 1,565 pigs, at a cost of £4,106.

The Town of Patea is situated on the coast, at the extreme southern end of the district, and has a population of 700. There is a splendid grazing district inland, with a large area of land yet to be opened up. There is a dairy factory, which has two branch creameries in the country. A refrigerating company for dairy and other produce has also been established, and is proving a great success. Exports for 1903 were: Wool, 5,310 bales; fungus, 891 bags; tallow, 356 casks; pelts, 152 casks; loose hides, 3,820; grass-seed, 343 sacks; butter, 100,558 cases; flax, 99 bales; meat, 3,859 cases; sheep, 459; sundries, 476 packages; bacon, 67 cases; empties, 981; transhipment, 214 tons. Imports: Ordinary, 9,166 tons; coals, 2,544 tons. Wharfages amounted to £1,388, dumping dues £375, tonnage dues £437. The number of steamers in and out were 202. The Harbour Board has an up-to-date wool-dumping press and hydraulic pumps. The width between the east and west pier-heads is 260 ft.; width of channel about 180 ft., gradually narrowing to 100 ft. as the beacons are approached. The pilot reports the depth of water at not less than 12 ft. at high-water springs, and 9 ft. at high-water neaps, with a straight channel. Steamers trade regularly to Westport, Greymouth, Lyttelton, Wellington, and other ports. The Board is now engaged in erecting a west breakwater, of concrete, to be carried out to a distance of 600 ft., and this should prove a great protection to steamers, and prevent the encroachment of sand common to bar harbours.

Stratford, a comparatively young town, lies about midway between Patea and New Plymouth. It has already a population of over 2,100, and is growing fast. The height above sea-level is 1,000 ft., and the climate is bracing though somewhat moist. The main road to Auckland—known as the Stratford–Ongarue (now Ohura Road)—starts here. It has been formed as a cart-road for fifty-six miles and a half, and as a bridle-road to sixty-four miles and a half. There are three miles of bridle-track and sixteen miles of dray-road to be formed before through communication with Ohura is established, but, still, the trip right through on horseback is possible, the unformed track not being very difficult. A commencement has been made with the construction of the railway-line between Stratford and Auckland *viâ* Ongarue, the line being almost completed as far as Oruru. Trains are running to Toko. A short branch is also projected from Waipuku to Mangonui, on the slopes of Mount Egmont. This line is for the purpose of opening up the extensive stone deposits that exist in the Mangonui Gorge of great value for road-metalling and railway-ballasting purposes. A bacon-factory has been started at Stratford under very favourable circumstances, and is likely to prove a public benefit, and also a financial success to the proprietary company. The works are on a fair scale and up to date. The machinery is driven by a 30-horse-power Victor turbine, the power being obtained from the Patea River through a tunnel 865 ft. long, cut across a bend in the river. The refrigerating engine is a 6-ton British Linde, while hot water is supplied from a high-pressure boiler in an adjoining building. The chilling-chamber holds about 120 carcases (or one day's killing); here they remain overnight, and are then passed on to the curing-room, a spacious compartment of 80 ft. by 26 ft., capable of holding 1,000 carcases; from here they pass to the drying-room, of same size and capacity, on the upper story. A brick smoke-house, capable of dealing with 600 pieces at a time, has also been erected. The piggeries and slaughter-house are about a mile from the works, and are connected by tramway. The former consist of twenty compartments holding ten pigs each, and are conveniently arranged for feeding, &c. The output during the past season was 3,419 pigs, costing £8,719.

Waitara, a seaport town of about 900 inhabitants, is situated on the river of the same name, a mile up from the sea, and about ten miles north-east from New Plymouth. The Mount Egmont Freezing-works have passed into the hands of a company styled the "Waitara Freezing and Cool Storage Company, Limited," who have rebuilt and greatly enlarged the works, the storage capacity now being for 25,000 carcases of mutton, together with five freezing rooms, capable of

hanging 1,200 carcases; also a beef-chilling room and a mutton-chilling room. Provision is made at the slaughterhouse for accommodation of fourteen mutton and three beef butchers. The freezing-plant is a 60-ton Hercules, and is guaranteed to freeze 1,500 sheep per day. The boiling-down and tallow department is most complete and up to-date, and a large manure plant has now been erected. The works are fitted throughout with electric light. The following were the direct shipments Home during the year: 1,736 tons of frozen meat, 4,435 bales of wool, 24 bales of leather, 660 casks of tallow, 27 casks of pelts, and 271 sacks of grass-seed. All produce is conveyed on board the New Zealand Shipping Company's ocean-going steamers (which anchor in Waitara roadstead) in specially constructed and insulated bags. These works are gazetted as Government grading and cool stores, which is a great convenience for outside dairy factories, as it avoids risk of injury to their produce after it has been graded. The exports from the port for the year 1903 were: Wool, 156 bales; grain, 74 tons; grass-seed, 602 sacks; hides, 1,703; skins, 85 bundles; timber, 10,924 super. feet; flour, 41 tons; potatoes, 471 sacks; tallow, 35 casks; pelts, 64 casks; cattle, 460 head; horses, 24; sheep, 288; frozen meat, 1,736 tons; butter, 21 boxes; fungus, 13 bales; general cargo, 591 tons. Total tonnage of exports for year was 4,136 tons. Imports for same period were: Grain, 3 tons; manure, 215 tons; lime, 36 tons; timber, 369,934 super. feet; coal, 3,606 tons; wool, 335 bales; fungus, 42 bales; hides, 33; skins, 38 bundles; flour, 27 tons; horses, 7; flax, 657 bales; butter, 626 boxes; general cargo, 3,359 tons. Total tonnage of imports, 8,259 tons; making in all a gross total of 12,395 tons of cargo handled at the port during the year.

Inglewood, situated on the railway-line, sixteen miles south-east of New Plymouth, is a flourishing little town of some 950 inhabitants, rapidly coming to the front. The bacon-factory during the year put through 2,333 pigs, costing £5,774. The factory is worked by a 24 in. turbine, the water being conveyed in a race 10 chains long. It is provided with a four-horse-power tubular boiler, a Lard jacket, and Californian pump. There is also a size "D" ammonia refrigerating machine.

Eltham, a rising borough of 1,400 inhabitants, is making very rapid progress. The bacon-factory during nine months of the year put through 1,141 pigs, valued at £2,757. The works were closed down at the end of September, 1903, pending extensive alterations.

Opunake, a seaport town of 600 inhabitants, was visited during the year by 45 steamers. Imports, 956 tons; exports, 100 tons; but more than half the trade of the district does not come or go through the port; in fact, the goods carried by road are on the increase. If the railway from Eltham is made this town should make rapid strides, as it is intended to improve the harbour.

The only other towns of importance are Manaia, population, 450; and Normanby, population, 400.

Roads and Railways.

The chief means of communication is the railway from Wellington, which traverses the district between Patea and New Plymouth—a distance of sixty-six miles. Through trains run every day, except Sunday, between New Plymouth and Wellington, and *vice versa*, a distance of 251 miles. As already stated, a railway from Stratford to Whangamomona has been commenced, and is already open so far as the village of Toko, six miles and a half from Stratford. This line will eventually be extended to connect with the North Island Main Trunk Railway at Ongarue Station.

The Main North Road runs from New Plymouth, passing through the Towns of Waitara and Urenui; and is formed as a cart-road to Mokau, the northern boundary of the district. All the streams are bridged with the exception of the Mokau River, on which is a good ferry. From Mokau there is a dray-road right through to Te Kuiti, on the Auckland railway system. About midway between New Plymouth and Waitara the Mountain Road diverges and runs almost due south, and chiefly along the railway, for a distance of forty miles, connecting with the Main South Road at the Town of Hawera. This is at present the principal road in the district, tapping, as it does, large numbers of district roads, and passing through the Towns of Inglewood, Midhirst, Stratford, Eltham, Normanby, and Hawera.

The Ohura Road branches from the Mountain Road at Stratford. It is formed and open for traffic as a dray-road for fifty-six miles and a half from Stratford and for horse-traffic to sixty-four miles and a half. A coach runs in summer time every Monday and Thursday (returning on following days) between Stratford and Whangamomona Village, a distance of forty-one miles, and the road is now being extended into the interior so as eventually to connect with Auckland, and will open up a large area of fertile country.

The Main South Road from New Plymouth follows the trend of the coast to the south, and was at one time the coach-road to Wellington. It passes through the Villages of Omata, Oakura, Okato, Rahotu, Otakeho, Manutahi South, and Kakaramea, and the Towns of Opunake, Manaia, Hawera, and Patea.

The Junction Road runs south-east from New Plymouth, and crosses the Mountain Road and railway at Inglewood, thirteen miles out; it is metalled for thirty-six miles and a quarter, formed as a dray-road to forty-five miles and three-quarters, where it connects with the Ohura Road at a distance of thirty miles from Stratford. This road crosses a number of district roads; hence its name.

The Opunake Road runs from Stratford to Opunake, twenty-six miles, skirting the southern base of Mount Egmont. It is formed and metalled for twelve miles from Stratford; the remainder is open for horse-traffic only. Vehicular traffic turns down the Manaia Road to Kaponga, thence along the Eltham–Opunake Road to the latter place. This route is metalled throughout.

The Eltham Road runs from Eltham to Opunake, twenty-five miles, connecting with the Opunake Road at Punehu, seven miles from Opunake. This is formed and metalled throughout.

The other main roads in course of construction are the Rawhitiroa Road, leaving the Mountain Road near Eltham; the Otaraoa, Moki, and Okoke Roads.

Lands open and available for ordinary Selection.

In Ohura and Aria Survey Districts, and situate on roads branching from the Ohura Road, between Tuhara and Ongarue: Thirteen allotments, comprising 14,141 acres, generally slopes and spurs covered with mixed forest, some open land; fair soil, on papa formation, and well watered. The land is suitable for sheep and cattle raising.

In Opaku, Kapara, Omona, and Taurakawa Survey Districts: Sixty-three allotments, comprising 60,662 acres, lying inland of Waverley, Waitotara, Patea, and Hawera, also to the east of Eltham, and tapped by the Eltham–Waitotara Road, and branch roads leading from the towns named. Generally rough country, wholly covered with heavy mixed forest; soil varying from fair to good, on papa and sandstone formation, and well watered. The land when cleared will be suitable for sheep and cattle raising.

In Mahoe, Ngatimaru, and Upper Waitara Survey Districts: Seventeen allotments, comprising 11,806 acres, lying at the back of the settled districts around Strathmore, Pohokura, and Whangamomona, and tapped by branch roads from the Ohura Road. Generally rough country, wholly covered with mixed forest; soil fair to good, on papa formation, and well watered. The land when cleared will be suitable for sheep and cattle raising.

In Waitara, Upper Waitara, and Pouatu Survey Districts: Thirty-eight allotments, comprising 36,519 acres, lying at the back of the settled districts of Urenui, Uruti, and Tongaporutu. Generally rough country, wholly covered with mixed heavy forest, and well watered. The land when cleared will be suitable for raising sheep and cattle, and on the flats along rivers and streams may be found small areas suitable for dairying operations.

In the Upper Waitara Survey District: Five allotments, comprising 7,464 acres, lying at the back of the settled district round Purangi, and tapped by the roads leading from the Junction Road. All rough, broken country, covered with heavy mixed forest; soil fair, on papa formation, well watered. The country when cleared will be suitable for sheep raising.

Lands being prepared for Settlement.

In the Upper Tongaporutu District: 44,800 acres, chiefly in the Waro Survey District, comprising easy to broken country of good quality, covered with heavy forest, and lying on the upper watersheds of the Tongaporutu, Mohakatino, Mangakara, and Tangarakau Rivers.

In Ohura and Piopiotea West Survey Districts, between Ohura and Wanganui and Ohura Rivers: 44,000 acres, undulating and hilly country, of fair quality, covered with mixed forest, scrub, and some of it open country.

In Opatu Block, in Heao Survey District: 3,900 acres, comprising undulating and hilly country of good quality; portion of it open, in grass, fern, and scrub, remainder light forest. Situate near confluence of the Ohura and Wanganui Rivers.

In Whangamomona District, on the watersheds of the Lower Whangamomona and Tangarakau Rivers: 24,000 acres, hilly country of fair quality, covered with heavy forest.

Total, 116,700 acres. All the lands will be found suitable for mixed occupation, such as raising young cattle and sheep, and in the more favoured localities for dairying.

In addition, 190,000 acres are in the hands of the Crown partially explored a good deal of which will be suitable for settlement.

There are 429,800 acres of land in this district still in the hands of the Natives.

A guide, giving particulars of any Crown lands open for selection, will be supplied free to any one applying personally or by letter to the Lands and Survey Department, New Plymouth.

It may be said, in conclusion, that there is every sign of genuine prosperity throughout the district, which has advanced rapidly during the last few years, and will no doubt continue to do so.

THE HAWKE'S BAY LAND DISTRICT.

E. C. Gold Smith, Chief Surveyor.

The Land District of Hawke's Bay comprises that portion of the east coast of the North Island from Cape Turnagain, in latitude 40° 30′, northwards to Lottin Point, about thirty miles beyond the East Cape, and contains the Waiapu, Cook, Wairoa, Hawke's Bay, Waipawa, Patangata, Woodville, and Weber Counties.

It has a seaboard of 300 miles, with an average depth from the coast of forty-five miles, and embraces an area of 6,063,000 acres. Its western limit is defined by the Ruahine, Kaweka, Ahimanawa, Raukumara, and other high ranges that form the watershed between the rivers flowing through it to the sea, and those that run to the west coast and the Bay of Plenty.

Physical Features.

The Ruahine Range extends northwards for about sixty miles from the Manawatu Gorge as far as the valley of the Ngaruroro River. Its altitude varies from 3,000 ft. to 6,000 ft., and for a considerable distance its summit is snow-clad during the winter months.

The Kaweka, a shorter range, divided from the Ruahine by the Ngaruroro River, attains an altitude of 5,650 ft., is very rugged and steep, and a prominent feature in the landscape in winter, covered as it then is with snow.

From these two ranges, which fall very abruptly on the Hawke's Bay side, the land slopes gradually to the sea, forming in some parts fine rolling hills—the essence of a sheep-country—in others extensive plains, with comparatively little poor soil.

Northwards from the Kaweka there is a series of forest-clad ranges of varying height, stretching away in the direction of the East Cape. Hikurangi, the highest point, is a bold peak with an elevation of 5,606 ft., rising so abruptly on all sides that the ascent can be made only at one point, and that with difficulty.

The only lake in the district of any extent is Waikaremoana, so famous for its magnificent scenery. It lies about thirty-five miles inland of Wairoa (Clyde), and is eleven miles in length, with a breadth at the widest part of about eight miles. Nestled among precipitous mountain-ranges, wooded to the water's edge, with numerous bays and inlets, it has a natural beauty hardly to be surpassed.

From Wairoa there is a formed road to the lake, and twenty-five miles round it, as far as the Oporuahine River.

The principal plains are: (1.) The Ruataniwha, some fifty miles south of Napier. This is 120 square miles in extent, is for the most part occupied as sheep-runs, and carries a large quantity of stock. (2.) The Heretaunga Plain, with an area of ninety square miles, lying immediately to the south of Napier. This is rich alluvial land; a large portion is thickly settled, the remainder used for grazing and agriculture. The only other plain of any extent is at Poverty Bay. It has an area of sixty-five square miles, is very fertile, well cultivated, and has a large population.

The district is well watered throughout by numerous rivers and streams, but none are navigable except the Wairoa and Turanganui, and these only for vessels of light draught. They are both tidal, and serve as ports to the Towns of Wairoa (Clyde) and Gisborne.

Communication.

The chief outlets from Napier are three in number. First the Napier–Wellington Railway, which traverses the centre of the southern half of the district for its whole length of 100 miles, and may be called the main artery of communication. Parallel to it throughout runs an excellent gravelled road, which was made before the construction of the railway. On either side there are numerous branch roads, which act as feeders, making a very complete system of internal transit. Another main road runs in a westerly direction to Kuripapanga, distant forty-five miles, a favourite resort in the summer time, removed as it is from the heat of the country near the coast. A coach runs thither twice a week, and on thence to Inland Patea, where the Napier Road meets the roads to Hunterville, Tokaanu, and the Wanganui River.

The part of the district served by these two main lines—viz., that between Napier and Woodville—contains the greater portion of the population, and from the extent of arable land within it is likely in the future to be very thickly peopled. Notwithstanding that so much of the Native land in this part is unoccupied and in its natural state, there are nearly a million of acres of land in sown grasses.

The main road northwards from Napier is the coach route to Taupo, which, soon after leaving the fertile Petane Valley, begins to traverse poor country, and twenty-five miles out enters the light pumice soil.

The Napier-Wairoa Road has been completed, with the exception of bridges at Waikare and Matahouroa Streams, and there is a weekly mail-coach service between the two towns. The coach is stopped occasionally by floods at the streams mentioned, and until the bridges are completed the heavy traffic between the two places will be done by a small steamer.

From the Wairoa a main road runs northward, through the Village of Tiniroto and on to Gisborne, a distance of seventy-five miles. For a considerable distance it runs through hilly country, and, as it has not been gravelled, wheeled traffic is suspended during the winter months; but a coach runs weekly for nine or ten months out of the year. The road from Wairoa to Gisborne *viâ* Nuhaka Hot Springs is completed and open for wheeled traffic.

Between Gisborne and Opotiki, in the Bay of Plenty, communication is not good. The road, which is 120 miles in length, has been formed to the Motu Township, a distance of sixty miles. In the neighbourhood of the forest a large area of Crown lands has been taken up and settled during the last few years. The rest of the journey must be done on horseback. A railway is being constructed from Gisborne in the direction of Motu. The portion from Gisborne to Ormond, a distance of ten miles, and for three miles beyond to Kaiteratahi, is open for traffic. The continuation of this line will greatly assist the progress of the district.

The country to the north of Gisborne is being rapidly opened up, the coastal road being open for traffic as far as Port Awanui, while several of the arterial roads are being extended.

Small steamers trade regularly along the coast, calling in at Tolago and Tokomaru Bays, Waipiro, Tuparoa, Awanui, Kawakawa, and other small bays.

Pastoral Industries.

The Hawke's Bay District is pre-eminently a sheep-grazing country, and the large area of 2,566,106 acres has been improved and sown in English grasses, clover, &c. In April, 1903, there were 4,398,087 sheep in the district, and the numbers of other stock were as follows: Horses, 31,775; cattle, 201,012; and swine, 18,514. The value of the wool exported from Hawke's Bay for the year ended 30th June, 1903, was £575,575, a considerable increase over previous year.

Freezing-works are established at Tomoana, Port Ahuriri, and Gisborne, and the export of frozen meat for the year ended 30th June, 1903, was as follows: Beef, 1,684 tons, valued at £45,468; 283,506 carcases of mutton, valued at £219,717; 155,373 carcases of lamb, valued at £97,108; preserved meats, 174 tons, valued at £8,700. The total of the above shows a very gratifying increase over previous year's figures—namely, £310,968—and instances the effect of increased settlement and the continued prosperity of the district.

Timber Industry.

As showing the importance of this industry, there are numerous sawmills in the district, and, outside of wool, frozen meats, tallow, and pelts, sawn timber ranks first in the value of the exports. 2,791,703 ft. of timber were exported during the year, the total value being £13,955. It is satisfactory to note that sawmills have been established at Pohui and Puketitiri, in which districts there are large areas of valuable forest. As the bulk of the sawn timber from these places must necessarily come through Napier, it follows that the port and trade of the town will reap immense benefits from the further development of the industry in its vicinity.

Trawling Industry.

The trawling industry has received a decided impetus during the year by the addition of several new steamers, the fleet now numbering seven. Thirty-eight tons of fish, valued at £380 were caught during the year, which is a considerable increase. It is a pleasing fact that the fish are now more plentiful, evidenced by the splendid catches recorded when the steamers are not prevented from working by stress of weather.

Agricultural Pursuits.

Agriculture is not carried on to the extent it might be with so much land suitable for root and grain crops. No doubt this is due to the profits made in sheep-farming. It is chiefly confined to the Heretaunga Plains and the flat lands near Gisborne. The soil is favourable to root-crops; potatoes range from 12 to 15 tons to the acre, and in some instances exceed this amount. Only a moderate quantity of grain is grown; barley, for which the soil seems well adapted, returning from 20 to 60 bushels of good sample to the acre.

The fruit growing and canning industries have now attained some importance. There are large orchards at Hastings and Havelock North, and also vineyards at Taradale and Greenmeadows.

Dairying.

Settlers are now turning their attention to dairying, and factories have been established in the bush districts at Norsewood, Ormondville, Maharahara, Hastings, Gisborne, and Woodville, whilst several others are in contemplation. At the last-mentioned town a cheese-factory has been in existence for some years, and turns out an excellent article much sought after in other parts of the colony. There can be no doubt that the further development of the dairying industry must materially benefit the farming class—especially the small farmer, who may find it difficult to make a living out of sheep.

Other Industries.

Other industries, such as fellmongeries, soap-works, boot, coach, sash-and-door, and rope-and-twine factories, &c., are established in the principal towns. During the year 1901 the Hawke's Bay Woollen Manufacturing Company commenced operations in their factory at Napier, and now gives employment to a large number of hands.

Climate.

The climate is generally of a mild character, and, though hot along the coast-lands in the height of summer, it is, owing to the dryness of the atmosphere, not so relaxing as in parts of the island farther north. The rainfall is light, excepting in the bush districts and high inland country.

Napier itself is recommended by many medical men as a resort for invalids suffering from pulmonary complaints, chiefly on account of the mildness of its winter season. The average rainfall for thirty-four years is 37·070 in.

Towns.

Napier is pleasantly situated on the peninsula known as Scinde Island, which is joined to the mainland by a narrow shingle-bank several miles in length. It is a busy town, with a population of about 9,500. The business part is on the flat land at the foot of the group of hills that take up the greater part of the peninsula. These hills, formerly barren and waste, are now occupied by numerous private residences, and the very general tree-planting has given the upper town a distinctive and pleasing character. There is a good water-supply, derived wholly from artesian wells of large size, and pumped by machinery to reservoirs on the tops of the hills. The shipping trade, as the large exports show, is especially active during the wool and frozen-meat season. It is still carried on at Port Ahuriri, about a mile from the town; but has recently, in a large measure, been transferred to the fine breakwater which is now partially completed. During the year 1903, the imports amounted in value to £234,994, and the exports to £892,238.

Gisborne, the trade-centre and port of what is known as the Poverty Bay District, is a prosperous town of nearly 3,000 inhabitants, exclusive of Maoris, rapidly increasing in size and importance, as the large quantity of unimproved land in the Cook County is fast becoming settled and made productive. There are 1,281,414 sheep in Cook and Waiapu Counties, and Gisborne's exports amounted to £541,077 in value for the year 1903.

Clyde, the county town and port of the Wairoa County, is picturesquely situated on the Wairoa River, about three miles from the mouth. The river is navigable for small craft as far as the village of Frasertown, twelve miles further up.

With a few exceptions, the towns and villages to the south of Napier are all situated on the line of railway running from that city to Wellington. The principal are: Hastings, a rising town of about 4,000 inhabitants, Waipawa, Waipukurau, Dannevirke, and finally Woodville, about three miles from the Manawatu Gorge, and distant ninety-eight miles from Napier. It is at this end of the district that the Crown has, in the last few years, successfully planted settlement, and, in place of the continuous forest known as the Seventy-mile Bush of earlier days, there are now prosperous townships, with various thriving industries established.

Crown Lands.

The land held by tenants of the Crown, of whom there are 1,173 in the district under the various systems of tenure, amounts to 726,336 acres, and there remain about 265,488 acres not yet dealt with in any manner.

The latter is, for the most part, suitable for pastoral purposes only, any fit for agriculture lying in small, isolated spots, widely scattered, and such as could not be selected independently of the surrounding inferior land. Nearly the whole is broken forest country, fitted more for sheep than cattle, and having an average carrying-capacity, when cleared, of about one sheep to the acre, though the best of it might

possibly graze from two to three. The land is chiefly in the Hangaroa, Koranga, Mangatoro, Norsewood, and Motu Districts, and the back-country of the Waiapu County.

About 64,093 acres are now open for selection. This area includes lands open under the small grazing-run system.

The following is a short description of some of the areas to be dealt with in the future :—

Tutamoe Survey District.—7,750 acres, being the Huiarua No. 1 and Tutamoe Blocks; all bush, broken, soil medium. Situated about thirty miles from Tokomaru.

Koranga, Tuahu, and Moanui Survey Districts.—About 48,000 acres, being part of the Tahora No. 2 Block, situated north of Waipaoa and Ruakituri Rivers, and between them and the Koranga River. It comprises some very hilly country, but, though nearly all the land is covered with bush or scrub, there is some fair soil, and would make fair pastoral country. All well watered. North of this portion the Crown has some 70,000 acres in the Auckland Land District, west of the Waioeka River.

Moanui Survey District.—About 16,500 acres. All hilly forest land, at an elevation from 900 ft. to 3,500 ft. First-class soil. Distance from Gisborne, fifty miles.

Patoka Survey District.—4,028 acres, chiefly forest country, with light soil. Part river-bed.

Puketapu Survey District.—320 acres, in Block I. Waste land, north of the Pokopoko Stream, and west of Sections 16 to 20. Chiefly gullies.

Tahoraite and Norsewood Districts.—About 8,416 acres 1 rood 30 perches, being portions of Tamaki Nos. 1, 2, 3, 4, and 5. Bush country, all covered with heavy forest. A good proportion undulating land. All well watered. It will probably be some time before this block is opened for selection.

Norsewood Survey District.—Piripiri Block, 10,207 acres. It will probably be some time before this land is in the market.

In addition to the foregoing, there is an area of 5,315 acres, principally small blocks scattered over various districts, as follows: Mata, 1,320 acres; Hikurangi, 1,623 acres; Tokomaru, 216 acres; Waingaromia, 832 acres; Uawa, 53 acres; Hangaroa, 486 acres; Waiapu, 640 acres; Matakaoa, 145 acres.

Native Lands.

Of the Native lands in this district, a very considerable portion has been leased to Europeans, but there still remains in the hands of the Maoris a valuable estate, comprising both agricultural and pastoral country, and including some 800,000 acres of excellent land. This land lies for the most part in the Waiapu County, towards the East Cape.

Thermal Springs.

At Waipiro Bay and Nuhaka thermal baths have been constructed and their medicinal properties are highly spoken of. Both places are now accessible by coach, and the number of visitors, especially in the summer-time, is considerable.

THE WELLINGTON LAND DISTRICT.

JOHN STRAUCHON, Chief Surveyor.

The Wellington District is bounded towards the north by the Auckland District; towards the east by the Hawke's Bay District, to the sea; thence by the sea to the Patea River on the West Coast; and thence bounded towards the west by the Taranaki District. The area contained within these limits is about 6,810,958 acres. It lies between the parallels of 39° and 41° 30′ south latitude; its greatest length north and south is about 180 miles, and its mean width east and west about sixty miles.

General Physical Features.

The district is divided into two well-defined parts by a mountain range, which forms part of the backbone of the North Island. At its northern end this range—there known by the name of Ruahine, and averaging a height of about 4,000 ft.—divides Wellington from Hawke's Bay; but after passing the point where it is intersected by the Manawatu River, the range takes the name of Tararua for many miles, until, at about forty miles from the termination on the shores of Cook Strait, it divides into two main ranges, known respectively under the general names of Rimutaka and Tararua, both ranges averaging from 2,500 ft. to 3,500 ft. in height, the highest point being 5,154 ft. Parallel to the main range, and divided from it by the Wairarapa Plain and the undulating country to the north, is a series of ranges at a few miles inland from the East Coast, known as the Puketoi, Taipo, Maungaraki, and Haurangi Ranges. Lying on the northern border of the district are the Kaimanawa Ranges, for the most part open and grass-covered, rising to a mean height of about 4,500 ft. Westward from the latter mountains, and divided from them by a deep, broad valley, in which flow the Waikato and Wangaehu Rivers, is the volcanic chain of mountains containing Ruapehu, 9,008 ft., and Ngauruhoe, an active volcano, 7,515 ft. high. The long sweeping curve of Cook Strait, forming the south-western limit of the district, is bordered, from the Patea River to within thirty miles of Wellington, by a comparatively level and undulating country, now nearly all under cultivation, having an average width of about fifteen miles. This is one of the finest parts of the colony, and is celebrated for its stock-raising capabilities. It was originally in a great measure open, though the southern part, where the plain is narrowed in between the sea and the Tararua Range, has a good deal of forest on it, now fast disappearing under the axe of the settler.

Inland of this coastal plain, at varying distances from the sea, the country gradually rises to a mean height of about 1,500 ft. to 1,800 ft., and becomes a good deal broken in character. It was originally forest-clad almost throughout. It is much cut up by rivers and streams flowing from the interior to the sea, of which the principal, commencing from the north, are these: The Waitotara, the Wanganui, the Wangaehu, the Rangitikei, the Oroua, the Pohangina, and the Manawatu, which last, after leaving the gorge in the Ruahine Ranges, runs through level land to its mouth in Cook Strait. This broken country, being everywhere composed of papa, or marly formation, which takes grass excellently, promises in the near future to be a large sheep-carrying district.

At about fifteen miles south of the volcanic peaks of Ruapehu Mountain the papa country terminates in a fairly well-marked escarpment, giving place to a more level and undulating country formed of volcanic matter, the greater portion of which is forest-clad, though on the south-east, east, and west sides of that mountain there are open grassy plains, of no great fertility, but yet suited to pastoral pursuits.

To the eastward of the main range formed by the Rimutaka and Tararua Ranges is the great depression known at its southern end as the Wairarapa Plain, which gradually rises northwards from the lake of that name into wooded, somewhat broken country, of no great height, at a distance of some forty-five miles from the sea. From here the country falls again slightly to the Upper Manawatu River, the depression in this part being marked by the extensive flats in the neighbourhood of Pahiatua, and by the shallow valleys of the Mangahao, Mangatainoko, and Tiraumea Rivers and their branches. For thirty miles from the sea this great valley is mostly open, with patches of forest here and there, but becomes more plentifully wooded at the base of the Rimutaka and Tararua Ranges. The quality of the soil varies from light and stony on the Wairarapa Plains proper to rich papa country as the northern end is approached. The southern end of this country is watered by the Ruamahanga River and its tributaries. Generally the district is a pastoral one, though agriculture is also pursued successfully. The neighbourhood of the Puketoi Ranges is in many places composed of limestone, and promises in the future to become a very rich pastoral district, such as will support a considerable population. In the forks formed by the Tararua and Rimutaka Ranges the Hutt River takes its rise

and runs in a southerly direction through an undulating or level country, finally falling into Port Nicholson. The valley contains some very fine land, generally held in small holdings.

Plains.

The two most important of these have already been mentioned. On the eastern side of the main range the Wairarapa extends northward from the lake of that name for about forty-seven miles, with an average width of about nine miles. In some parts, especially on the flats along the Ruamahanga River, the soil is alluvial and rich; in others, though stony and unfit for cultivation, it is nevertheless grassed, and carries stock well in the winter and rainy seasons. The plain is watered by the Waiohine, Waingawa, and Ruamahanga Rivers, and contains altogether about 200,000 acres, much of which is good agricultural land. On the other side of the district, west of the Tararua and Ruahine Ranges, there is a large block of land so nearly level that it may be called a plain, extending from Paikakariki (twenty-seven miles from Wellington) to Marton (a few miles north of the Rangitikei River), and contains about half a million acres. Starting as a narrow strip between the hills and the sea, the plain widens out by degrees until at Feilding it is at least twenty miles in breadth. Along the beach runs a fringe of sandhills, but behind this is to be found some of the best farming and grazing land in the colony. There are two plains inland—Murimotu and Waimarino—both lying some 2,200 ft. above sea-level, in the neighbourhood of Mount Ruapehu, the former to the south and the latter to the north-west of the mountain. The soil is covered with a coarse native tussock, and, though capable of carrying stock, is of a light porous nature, and cannot be classed as agricultural land.

Rivers

First among these is the Wanganui, with a length of 136 miles from its source, near Mount Tongariro, to its outlet. The Manawatu is next in importance. Rising in the Ruahine Range, it flows through the picturesque Manawatu Gorge, joining the sea at the port of Foxton. The Rangitikei, the third in size, rises in the Ruahine Mountains, and flows through the Awarua country, where it is joined by the Hautapu and other large tributaries. After a course of over a hundred miles it reaches the sea some little distance below the Township of Bull's, on the West Coast. Lesser rivers on the West Coast are the Waitotara (north of Wanganui), the Wangaehu (which takes its rise in Mount Ruapehu, and from its source to its mouth is so strongly impregnated with sulphur that fish cannot live in it), the Turakina, and the Otaki. The only other rivers of any size are the Hutt (Heretaunga), emptying itself into the Wellington Harbour, the Ruamahanga, flowing through the Wairarapa Valley and lakes into Palliser Bay, and on the East Coast the Pahaoa, Aohanga, and Akitio.

Lakes.

The only lake of any size in the Wellington District is the Wairarapa, lying between the Rimutaka and Haurangi Ranges, towards the southern end of the Wairarapa Valley. It is about twelve miles long and four broad, and is connected by the Ruamahanga River with Onoke, a small lake separated from Palliser Bay by a narrow shingle spit only. A passage through the spit is opened from time to time when the lake rises above its natural level and overflows the low-lying flats along its margin. Water-fowl of every kind—among them numbers of black swans—are to be found round about these lakes.

Scenery.

The views obtained from the railway-line in the ascent and descent of the Rimutaka Range are among the best in the neighbourhood of Wellington, and the road through the Forty-mile Bush was long considered one of the most beautiful drives in the North Island; but its beauty has been diminished by the felling of the bush consequent on the increase of settlement. The same may be said of the Manawatu Gorge, famed in the old coaching days for its lovely scenery, but now sadly marred by the construction of the railway-line. The most beautiful

drive now left is through the Awarua Bush, from Ohingaiti to Moawhango. From this road, as it winds round the spurs, most charming glimpses are obtained of the Rangitikei River and the blue hills beyond, and at other points the traveller looks up deep ravines where the graceful fern-tree stands out in bright relief against the dark green of the native bush. Another road from Pipiriki, on the Wanganui River, to the Murimotu Plain, traverses one of the most magnificent forests in the North Island. Here the bushman's axe has felled only the timber standing on the road-line, and the track runs beneath the shade of the largest and stateliest maire and rimu known. Beautiful as these drives are, the scenery on the Wanganui River is still more lovely. A few miles below Taumarunui the river enters a series of gorges, shut in by high precipitous cliffs. Sometimes the canoe glides slowly through quiet reaches, sometimes shoots rapids which make the traveller hold his breath till they are passed, and then again traverses places where the water is ever in turmoil, boiling and eddying in whirlpools, taxing the energies of the most skilful Native steersman, and testing the nerve of the most courageous tourist. These experiences, with the views obtained of the banks, densely wooded even where the papa rock rises almost straight from the water's edge, make the eighty miles journey from Taumarunui to Pipiriki an event not easily effaced from the memory. Between Pipiriki and Wanganui excellent steamers are now running, so that the beauties of the lower part of the river may be seen by all without trouble or discomfort. In summer time a launch goes as far as Taumarunui.

Forests.

The Wellington District is essentially a forest country, for out of the 6,810,958 acres contained within its borders about 3,000,000 are still under bush. By far the largest forest is the Waimarino, having an area of at least three-quarter million acres, a large portion of it being nearly level land, containing magnificent timber, principally totara, maire, matai, rimu, and other pines. This forest is as yet hardly touched, though timber is being cut at Raetihi for the settlers now making their homes in the neighbourhood. The distance from the settled districts or any port will render the timber in this part useless as a marketable commodity until the country is opened up by the Auckland Main Trunk Railway now in course of construction.

There is a large extent of bush land, drained by the Turakina, Mangamahu, and Wangaehu Rivers, extending up to the Wanganui River, and containing about 300,000 acres. Very little of this, from its inaccessibility, will be utilised for sawmilling purposes, but a great deal of it, together with a further block of 230,000 acres on the west side of the Wanganui River, will be cleared by the settlers and sown down with grass. A further block of about 100,000 acres of forest land lies in the Pohangina Valley and on the slopes of the Ruahine Range. A large portion of this has been taken up and is now being settled.

The forest land on the West Coast extends from Pukerua to the Manawatu Gorge, on the west side of the Tararua Range, and contains an area of about 300,000 acres, the bulk of it being fit only for turning into pasture. The most available part of it, alongside the Wellington–Manawatu Railway, is being extensively cut into by sawmillers at Levin and other places on the line.

After this in size is the forest on the eastern slopes of the Tararua Ranges, extending from Featherston to the Manawatu Gorge, which includes what remains of the well-known Forty-mile Bush, containing probably about 175,000 acres. Portion of this area is being quickly denuded of timber by the sawmills established at Pahiatua, Newman, Hukanui, Eketahuna, and by settlers. A tract of about 50,000 acres lying to the east of the Puketoi Range cannot be utilised for milling purposes, as it is not tapped by any branch railway-line, and its distance from the main line would probably render the business unprofitable except for local purposes. Nor are there any suitable ports along the coast where timber could be shipped.

The other forests are, one near Lake Taupo, and the Haurangi Forest on the east side of the Wairarapa Lake. These consist for the most part of birch-covered hills, and cannot be considered as valuable for milling purposes.

Soil.

It may be said that the Wellington Land District contains within its borders a greater quantity of good land than any other in the North Island, very little, except the mountain-tops, being unfitted for use, while some of it is of very superior quality, suited for the growth of the productions of every temperate climate. As much of it is still forest-clad, settlers must look forward to having to make their farms by felling and burning the bush before grass can be sown, and, as it takes from ten to fifteen years before the plough can be used in bush-land, grazing, for which the climate and soil is admirably adapted, will be the principal industry for some time to come. It is generally calculated that the cost of felling and burning ordinary bush varies from 25s. to 35s. an acre. To this must be added about 20s. for seed and fencing. It is no uncommon thing for a return to be received at from twelve to eighteen months after felling. The usual practice is to put sheep on to the new lands soon after the grass has obtained a good hold. The process of improving the lands by the gradual "logging up" and burning of the fallen tree-trunks is a long one, but it pays in the end, for in this way fine pasture-lands are obtained on the hills, and agricultural lands on the flats.

Climate.

The climate of Wellington District is healthy and mild, the mean annual temperature (in the city) being 55·4, whilst the mean rainfall is 48·49 in. per annum. The rainfall differs, however, according to locality. Inland and near the ranges it is much greater. The top of Ruapehu Mountain is covered with perpetual snow, which lies also on the tops of Kaimanawa, Ruahine, and Tararua in the winter. Frosts are heavy in the interior.

Harbours and Ports.

The coasts of Wellington are not so well supplied in this respect as are some other parts of the colony; but what is lost in number is made up in a great measure by the excellence of the chief haven—Port Nicholson—which, from the position it occupies, at the meeting-point, as it were, of the coastal traffic of both Islands, and from its sheltered position and depth of water, may be considered one of the most convenient harbours in the world. The Wanganui River, which has been considerably improved by artificial means, is the second port in the district, and has a considerable trade carried on by coastal steamers. The Patea and Manawatu Rivers are also used by coastal steamers, whilst several other inlets along the shore afford shelter and stopping-places, according to the direction of the wind. The extension of railways along both coasts has, in a large measure, done away with the inconveniences arising from want of harbours.

Towns.

The capital of the colony—Wellington—is situated in the south-west angle of Port Nicholson, on Lambton Harbour. The wharfage accommodation here is second to none in the colony, and the wharves present always a busy scene of life with the numerous steamers and sailing-vessels continually loading or discharging. As many as six ocean-going steamers are frequently seen alongside, loading with wool, frozen meat, and other products, for conveyance to Europe. The port possesses a patent slip at Evans' Bay, within a short distance of the city. Founded in 1840 by the New Zealand Company, the city occupies the flats skirting the original shore-line, long since obliterated by the reclamation of the foreshore, which is now mostly covered with fine buildings. Rising close behind the old shore-line is a range of hills, the lower parts of which are all built over. The population of the city at the present time is about 50,000, including the suburb of Melrose, which now forms part of Wellington. Being the seat of Government, the city contains the residence of the Governor and the headquarters of the Government departments, which are placed in what is said to be the largest wooden building in the Southern Hemisphere. There are several noticeable public buildings, amongst which must be mentioned the Parliamentary Buildings, containing a valuable library, General Post Office, Government Life Insurance Offices, Government Printing Office, Government Railway Offices, Public Library, School of Art, and Harbour Board Offices. The Colonial Museum

and the Botanical Gardens are also worthy of notice. The city is lighted by electricity, and its principal streets are being paved with wooden blocks, whilst an excellent supply of water is obtained from the Wainui-o-mata River, on the other side of the harbour. The installation of a system of electric trams is proceeding, and a fine Town Hall is nearly finished. The principal industries are represented by iron and brass foundries, sawmills, soap and candle works, boot-factories, aerated water, meat-freezing works, coachbuilding, rope-and-twine works, sash-and-door factories, brick, tile, and pottery works, printing and publishing offices, besides match and box factories, and other smaller works of various kinds. The city is increasing with rapid strides; its excellent position, together with the fine back-country, places it in the front rank of New Zealand towns. Its principal suburbs are Onslow and Karori, containing 1,800 and 1,700 inhabitants respectively. The railway-line to the Hutt Valley is now being straightened to afford greater facilities of transit, which are necessary in consequence of rapid developments.

Petone is situated near the mouth of the Hutt River, seven miles from Wellington, on the railway-line. It has a population of 4,750, and is a rising township, containing the Government Railway Workshops, a woollen-factory, and a meat freezing and preserving establishment. The Lower Hutt, almost immediately adjoining, has a population of 2,250, and some well-built residences with beautiful gardens. The Upper Hutt, situated at the head of the valley, has many small farms, owned by some of the very early settlers. The railway here starts the ascent of the Rimutaka Range.

Featherston, situated at the foot of the Wairarapa Valley, forty-six miles by rail from Wellington, is a small township, with butter and cheese factories in the neighbourhood. Roads lead from it to Martinborough and the East Coast, and also down the Wairarapa Valley to Palliser Bay.

Greytown is situated three miles off the main line of railway, and near the middle of the Wairarapa Valley, fifty-four miles from Wellington by rail. The chief industries are sawmilling and coachbuilding. The population is about 1,200 persons.

A few miles further north is the Town of Carterton, where are to be found timber-mills, cheese-factories, &c., and a population of about 1,300 persons. There is some splendid farming land in this locality on the banks of the Ruamahanga River.

Masterton is situated at the head of the Wairarapa Valley, on the Wellington-Napier Railway, sixty-seven miles from the capital. It is the centre of an agricultural and pastoral country, and has a population of about 4,000. It is lit with gas, drained on the septic-tank principle, and has several industries, such as fellmongery, rope-making, flax-mills, coach-factory, &c., and, in addition, has some excellent fish-breeding ponds, from which many of the rivers in the colony have been supplied with trout. An important coach-road leads from here through a fine pastoral district to Te Nui, and on to Castlepoint on the East Coast, where a large quantity of wool is annually shipped to Wellington for export.

North of Masterton is the Opaki Plain, and beyond is the entrance of the once famous Forty-mile Bush, which is now a thriving pastoral, agricultural, and dairying district. Butter-factories have been established at numerous centres.

Eketahuna is, by rail and road, eighty-nine miles from Wellington. From there a main road leads to Alfredton, and up the Tiraumea Valley, through the East Puketoi country, to Weber, and Dannevirke, the latter on the Napier Railway-line.

Pahiatua, a township eighteen miles beyond Eketahuna, has a resident population of about 1,250. It is the county and market-town of a large and improving district, and will probably also become the centre of a large dairying industry. Several branch roads run from Pahiatua into the adjoining country, the principal one leading to Makuri through a beautifully-wooded gorge. From there another branch road passes over the Makuri saddle into the East Puketoi country. Excellent fishing is obtainable in the neighbourhood.

On the West Coast, Pahautanui, at the head of the Porirua Harbour, is the centre of a small agricultural community of early settlers, the old coach-road to the West Coast running through it; and there is a branch-road leading over to

Hayward's in the Hutt Valley. Paikakariki, twenty-seven miles from Wellington, may be considered the commencing-point of the West Coast settlements, which are springing up in every available valley along the coast. At Otaki, forty-seven miles from Wellington, by rail and road, there is a township, and a large Native settlement. At Manukau, Levin, and Shannon, thriving townships have arisen since the Manawatu Railway Company opened up the land round about, much of it being rich farming and grazing country. Between Shannon and the Manawatu River there is a large raupo or flax swamp, named Makurerua, containing at least 15,000 acres of fine alluvial soil, which is being gradually drained, and will probably at some future period become grazing-land.

Foxton, a township at the mouth of the Manawatu River, is a small shipping port, containing about 1,250 inhabitants. It is connected with Palmerston North by a branch railway, and is the outlet for a large area of good agricultural land.

Palmerston North is an inland town at the junction of the Wellington–New Plymouth and the Palmerston–Napier Railways, situated on a fine plain in the midst of a most excellent farming district at a point eighty-seven miles from Wellington, and 112 miles from Napier. Its population is now upwards of 8,900. It is lit with gas, and has a good water-supply. A fine bridge across the Manawatu River connects it with the Fitzherbert Block, a tract of rich agricultural land. Nine miles from Palmerston is the Township of Ashhurst, at the mouth of the Pohangina Valley, up which settlement has now extended for a distance of twenty-two miles. Several large farm-homestead association blocks have been selected up this valley.

Feilding, ninety-nine miles from Wellington by rail, with a population of about 3,250, is becoming one of the most important towns on the West Coast, as it is the centre of a very fine locality, and the outlet for a large tract of inland country, the forest on which is fast being felled. Water supply and drainage-works are under construction. A coach-road connects it with Birmingham (Kimbolton) and Pemberton, about thirty-two miles distant. On the seaward side for a distance of twenty miles there is also much good agricultural land, extending on the north-west to the Rangitikei River, and including the Township of Halcombe. There are several dairy factories established in the neighbourhood.

Marton, 116 miles from Wellington by rail, with a population of 1,200, one of the earliest of the West Coast settlements, is also the centre of an agricultural country. The Township of Bull's, on the north side of the Rangitikei River, lies between Marton and the coast. From Marton Junction the southern part of the North Island Main Trunk Railway extends up the Rangitikei Valley to Hunterville, a good-sized township in the centre of a grazing district, and from thence as far as Mangaweka, thirty-two miles from Marton, by way of the Makohine Viaduct. A short distance beyond Mangaweka is the viaduct of this name, 964 ft. long, recently completed. The line is in a well advanced state to Taihape, and is already open for goods traffic to that place. The construction of the line is proceeding between Taihape and Waiouru. The distance from Marton Junction to the summit at Waimarino is about 104 miles. The coach-road has been made to Waiouru, and from thence to Tokaanu, on Lake Taupo, in the Auckland District.

Wanganui, situated near the mouth of the river of that name, is the oldest town after Wellington, from which it is 150 miles by rail—the distance by sea being only a hundred and twenty miles. It is the centre of an excellent farming district, and has a considerable trade, and several manufactories. Near the mouth of the river are freezing-works, the meat from which is conveyed by lighters to the large English steamers which lie off the mouth of the river. The town is lit with gas, and has a good water-supply. Not far from it are some extensive railway workshops. Altogether it is a thriving place, with a population of about 7,800. The Wanganui River is navigable for a light-draught steamer up to Pipiriki, a distance of sixty miles, and a launch goes a further distance of eighty-four miles to Taumarunui. A branch road extends from Pipiriki through the Waimarino Forest to Ohakune, and on to Karioi on the Murimotu Plains, thence by way of Turangarere and Moawhango to Napier.

Crown Lands available for Future Settlement.

Town Land.—Sections in Piriaka, Raetihi, Ohakune, Mowhanau, Taihape, Mataroa, and Pongaroa Townships will probably be opened for sale at Wanganui, Pahiatua, and Wellington on dates due notice of which will be given in the local papers.

About 20,000 acres, known as the Retaruke Block, on the Wanganui River. It is proposed to open this under the small grazing-run system during next summer.

Awarua Block.—There is an area of about 101,000 acres purchased by the Crown in this block available for future subdivision and disposal. This area for the most part consists of the rougher portion of the block, and will probably be occupied as pastoral country. It is proposed to offer an area east of Utiku at an early date.

Taonui, Maraetana, Pukewhakapu Blocks.—These blocks, which comprise about 12,500 acres, situated between the Mangawhero and Wangaehu Rivers, have been surveyed, and will be offered shortly on optional systems.

Improved-Farm Settlement Lands.

All the available land suitable for holding under the improved-farm conditions has now been allotted, but if any of the sections now held under this system should be forfeited they will probably be ballotted for amongst applicants in the district who are known to be of good character and likely to make good settlers.

Lands Open and Available for Ordinary Selection.

Waitotara.—The Te Ngaue Block, 1,546 acres of second-class pastoral land, is now open for selection in two small grazing-runs.

Waimarino.—A block of about 46,550 acres, on the Retaruke, Oio, and Kaitieke Rivers, has had roads surveyed through it, and portion of it lately surveyed is now open for selection on small grazing-run system. About 29,000 acres still remain open as unsurveyed land on optional systems. 32,000 acres at the head of the Retaruke and Makino Streams have also been roaded. The rest of the Waimarino country, containing about 250,000 acres, is more or less broken, and will probably be opened later on as second-class pastoral country or small grazing-runs, to enable it to be taken up in larger sections.

A number of forfeited sections are now open for selection in the following blocks: Marton No. 3, Umutoi, Waimarino, Hunterville No. 2, Mekalickstone, Kaiparoro, &c.

Tauakira No. 1 Block.—Five sections, of an area of 4,861 acres, are open for selection on optional systems. This block is situated on the Wanganui River, about twenty-eight miles from Wanganui.

Victoria College Endowment Block.—One lot of 2,200 acres is open for selection on the small-grazing-run system.

Wanganui River Trust Endowment Block.—This block of 9,733 acres is subdivided into four lots, open for selection on the small-grazing-run system.

Taonui, Maraetaua, and Pukewhakapu Blocks.—These blocks, which comprise about 29,600 acres of unsurveyed land situated between the Mangawhero and Wangaehu Rivers, are now open for selection under the optional systems.

Waimarino Block.—An area of 8,100 acres of Crown land and State forest is open for application as a grazing lease for a term of three years.

Rangipo-Waiau-Murimotu Block.—An area of 31,841 acres in this block is open for selection as a pastoral lease under Part VI. of "The Land Act, 1892," for a term of twenty-one years.

Kaitieke Block.—Ten lots, comprising an area of 5,150 acres, are open for selection on the small-grazing-run system.

Ohotu Block.—Seventy-one lots, comprising an area of 57,455 acres of Maori land, about forty-five miles up the Wanganui River, in the Ohotu Block, have been offered for selection for terms of twenty-one years with right of renewal. Particulars as to the lots still open can be obtained from the President, Aotea Maori Council, Wanganui.

Pipiriki Township.—Leases of several forfeited allotments for the term of twenty-one years, with right of renewal for a further term of twenty-one years, will be open for application by tender shortly.

Tokaanu Township.—Leases of ninety-nine allotments for the term of twenty-one years, with right of renewal for a further term of twenty-one years, are open for application by tender.

Potaka Township.—Leases of forty-four allotments for the term of twenty-one years, with right of renewal for a further term of twenty-one years, will be offered by auction shortly.

Hokio Township.—Leases of thirty-four allotments for the term of twenty-one years, with right of renewal for a further term of twenty-one years, are open for application by tender.

Wharangi (Foxton Sanatorium).—Leases of twenty-three allotments for the term of fourteen years are open for application by tender.

"Crown Land Guides" and sale lithographs, giving full particulars of lands open for selection in this Land District, will be forwarded to any one on application to the Commissioner of Crown Lands, Wellington.

Native Lands.

Townships are now surveyed at Pipiriki, Tokaanu, Parata, Potaka, and Hokio, sections in all of which are open for leasing under "The Native Townships Act, 1895."

The blocks under lease to Europeans contain about 374,700 acres, the principal being the Owhaoko, Mangohane, and Ruanui, occupied by Mr. Studholme; and the Oroumatua, leased to Mr. Birch. Of others passed through the Native Land Court there are about 562,415 acres which are fit for settlement, the principal being the balance of the Awarua and the Motukawa, Te Tuhi, Ahu-Ahu, Rangiwaea, and Puketotara Blocks in the central district; Raetihi in the Waimarino district; Tauakira and Ohotu, on the Wanganui River; Tupapanui, Maraetaua, Taonui, and Kaha-kaha, between the Wanganui and Wangaehu Rivers. Those not suitable for settlement at present are the Te Hautu, Ohuanga, and Kaimanawa, on the east side, and the Oahukura on the west side, of Tongariro Mountain, containing an area of about 345,000 acres.

The Native lands which have not passed the Native Land Court contain an area of about 105,306 acres, the principal being the Pukehika, Te Hautu, Waihunu, and Waipapa Blocks, on and between the Wangaehu and Wanganui Rivers, and some others on the west side of the latter river.

Pastoral and Agricultural Industries.

The pastoral industry is by far the more important, the total area in grass in 1904 being 2,597,131 acres as compared with 101,815 acres under crop, garden, or orchard. Of the area in crop, 6,772 acres were in wheat, 16,491 in oats, and 40,731 acres in turnips or rape, the rest being in potatoes or other crops.

The following figures will show the average return per acre of grain for the year 1904: Wheat, 32·36 bushels; oats, 30·82 bushels; barley, 31·49 bushels.

The area in sown grass now exceeds that in any other district in the colony, though the area under crop is very small as compared with either the Otago or Canterbury Districts. In April, 1903, there were 3,793,518 sheep; and in October, 1903, the cattle numbered 357,850, and horses 49,707. The total area in gardens is given as 2,295 acres; in orchards, 3,747 acres; and in plantations, 4,427 acres.

Dairy Industry.

Both soil and climate are well adapted for the production of butter and cheese, and hence we find creameries and butter-factories increasing in number very considerably each year, and the export constantly augmenting.

Forty-six butter and cheese factories were returned in September, 1903, as at work in the Wellington Provincial District.

Phormium Tenax.

The principal flax-mills working are at Featherston, Carterton, and Martinborough, in the Wairarapa, and at Foxton on the West Coast. This industry fluctuates greatly, in accordance with the price ruling for the dressed article. In 1901 twenty-five mills were at work, employing 580 men and 25 boys; the machines driven by water-wheel or engine working up to 365-horse power.

Timber Industry

Sawmills are to be found in different parts of the district where the means of communication are sufficient, the timbers cut being principally totara and red-pine, both of which are largely used in house construction and other works. Others of the native woods are very beautiful, but are utilised only to a small extent.

The principal mills are at Pahiatua, Eketahuna, Masterton, and Carterton, in the Forty-mile Bush and Wairarapa districts, and at Levin on the West Coast, besides which there are several mills in Wellington for dressing the rough material. In the whole district there were in 1901 sixty-six mills, of an aggregate of 1,114-horse power, engaged in this industry, employing 1,114 hands, the output of sawn timber being 41,375,471 ft., and the total value, including posts and rails, resawn timber, doors, sashes, &c., £210,589, which, next to Auckland, is the highest for any provincial district in the colony.

Miscellaneous Industries.

The numbers of the other principal industries in this provincial district, as given in Census, 1901, were as follow: Meat freezing and preserving works, 5; ham and bacon curing establishments, 3; fish-curing works, 4; grain-mills, 8; sugar-boiling and confectionery works, 4; breweries, 10; aerated-water factories, 24; sauce and pickle factories, 5; soap and candle works, 4; cooperages, 4; woodware factories, 5; gasworks, 6; brick, tile, and pottery works, 18; tinware factories, 13; iron and brass foundries, 13; printing offices, 40; basket and perambulator factories, 6; coachbuilding and painting works, 44; cycle-factories, 10; saddlery and harness factories, 29; tanning, fellmongering, &c., establishments, 14; sail and oilskin factories, 4; furniture and cabinet-making, 36; tailoring establishments, 67; dressmaking and millinery, 78; shirt-making, 7; boot and shoe factories, 24.

THE MARLBOROUGH LAND DISTRICT.

C. W. Adams, late Chief Surveyor.

Boundaries

The Marlborough Land District, occupying the north-east corner of the Middle Island, and containing about 2,792,500 acres of land, is bounded generally on the north and east by Cook Strait and the East Coast as far as the Conway River; thence by that river to its junction with the Towy River; from this point, by straight lines, rivers, and the summits of watersheds to the western side of Tennyson Inlet, Pelorus Sound. From the Conway to the Acheron River it abuts on to the Canterbury Land District, and from that river to Pelorus Sound it is bounded by the Land District of Nelson.

The widest part of the district is from Cape Campbell to Tophouse, a distance of about sixty-seven miles, and the extreme length from Cape Jackson to the Conway is 120 miles.

Physical Features.

The district throughout is generally mountainous, but none even of the highest peaks are covered with perpetual snow, although Tapuaenuku, the highest of the inland Kaikouras, attains an altitude of 9,462 ft. Of the Seaward Kaikouras, or Looker-on Mountains, the highest points are Kaitarau and Whakari, which are 8,700 ft. and 8,500 ft respectively. There are several lesser peaks, from 4,000 ft. upwards.

The view from Kahautara Bluff, south of Kaikoura Settlement, looking northwards, when the Looker-on Mountains are snow-capped, is said to be one of the finest in New Zealand.

Geologically, the district may be briefly described as follows: North of the Wairau River the rocks belong chiefly to the Upper and Lower Devonian series, with a belt of Silurian between them, embracing the country along the west of Queen Charlotte Sound to Cook Strait. Within these series auriferous deposits are found, and at present worked at Mahakipawa, Wakamarina, and Wairau Valley. In Endeavour Inlet an antimony-mine was worked for some time; but operations have been discontinued and the machinery removed. The country south of the Wairau River may be said to belong chiefly to the Carboniferous Age, with patches, along the coast and up the Clarence Valley, of Cretaceo-Tertiary and Lower Greensand formations; while along and between the Awatere and Clarence Rivers volcanic formation and numerous intrusive dykes occur. The Red Hills also, at the head of the Wairau Valley, are of volcanic origin.

Coal has been discovered in the neighbourhood of Picton, and in the Clarence Valley, but none has been as yet successfully worked within the district. A narrow belt of Tertiary limestone, suitable for building purposes, extends, with small interruptions, from Cape Campbell to the boundary of the Canterbury Provincial District. The Marlborough land may be divided into three classes: Open land, generally covered with associated grasses; forest-land; and intermediate, or land partly forest, partly covered with scrub, fern, or other rank vegetation. This original condition of the soil naturally gave rise to a localisation of industries, and a very unequal distribution of settlement. Thus the open country was taken up for pastoral purposes; in the forest country the timber industry was developed, and the intermediate land passed into the hands of farmers. Though agriculture is now extending into the pastoral and forest country, and considerable areas of forest land have been cleared and laid down in grass, the portions of the district characterized by these respective industries are still well defined.

In the northern part of the district, bounded by Cook Strait, numerous deep fiords and bays run far into the land. The principal of these are Pelorus and Queen Charlotte Sounds, Tory Channel, Port Underwood, and Port Gore.

These Sounds are very picturesque, but the hills surrounding them are not so rugged and precipitous as are those of the thirteen celebrated Sounds on the west coast of Otago and Southland.

Though generally steep, the land is not too rough to be used for pastoral purposes, and nearly all the land in the Sounds is occupied by thriving settlers.

Pelorus Sound, the most extensive and picturesque, is thirty-four miles long, following the course of the main channel, with the Town of Havelock at its head. There are many bays and inlets branching off in all directions; the largest of these is Kenepuru Sound, fourteen miles long. Pelorus Sound, including its branches, has a shore line of over 300 miles in length, not counting islands.

Queen Charlotte Sound is the next in length, being thirty miles from its entrance to its head; it also has many bays and inlets, one of which is Picton Harbour, twenty-five miles from the entrance.

Tory Channel is ten miles long, and forms the most direct line of communication between Picton and Wellington. The distance from Wellington Wharf to the entrance of Tory Channel is about forty miles, and about twenty more to Picton.

The shore-line of Queen Charlotte Sound and Tory Channel is over 200 miles in length. The entrance of Queen Charlotte Sound is about twenty miles distant from that of Pelorus Sound, and this latter is about twelve miles from the French Pass. Generally there is deep water in all the sounds and bays, and good anchorage can be found near the shore. The country is hilly everywhere in the neighbourhood of the Sounds, the highest point being Mount Stokes, 3,951 ft. above sea level.

Rivers.

Four considerable rivers, the Wairau, Awatere, Clarence, and Conway, rise towards the western boundary of the district; the two former, running east and

north, fall into Cook Strait; the two latter, taking a southerly and easterly course, discharge into the sea on the eastern side of the Island. These rivers water large and fertile valleys, but none can be entered by vessels except the Wairau, which is navigable for small steamers for about twelve miles from its mouth.

Plains.

The Wairau Plain, containing about 65,000 acres, on which stands Blenheim, the capital of Marlborough, is the principal block of agricultural land within the district. The soil, generally good, is, on the lower or seaward side of the plain, extremely fertile, especially in the neighbourhood of Tuamarina, Spring Creek, and near Blenheim, which is surrounded by numerous gardens, with rich deep mould, and well sheltered with trees. The average yield of wheat for the plain is about 25 bushels per acre; of oats and barley, 35; of peas, 30; and of potatoes, 10 tons per acre. Hops have been successfully grown for many years in the neighbourhood of the town, but, owing to the high price of labour, their cultivation has not extended. The plain, traversed in all directions by good macadamised roads, and dotted over with numerous comfortable homesteads, standing in clumps of trees amidst well-cultivated fields, has already an old-world appearance. More than half the population of the Marlborough Land District—about 13,000, according to the last census—is centred in the Town of Blenheim and on the Wairau Plain. Besides this plain there are several thousand acres of terrace flats and valleys along the larger rivers, notably at Starborough, on the Lower Awatere.

Lakes.

There are not any lakes worthy the name. The largest is Kapara te Hau, more familiarly known as Grassmere, situate on the coast between the Awatere River and Cape Campbell. It is about three miles in diameter, and very shallow, being, indeed, no more than a lagoon, as during a dry season there is little or no water in it.

There are two other lakes of small size, viz.,—Lake Elterwater, four miles south of Lake Grassmere, and Lake McRae, situate in the open country between the Awatere and the Clarence Rivers.

Forests.

The portion of Marlborough north-west of the Wairau River, extending to the boundary of the Nelson Land District, and including the County of Sounds, in all about 280,000 acres, was originally covered with dense forest. In the valleys and on the lower hill-slopes, rimu, kahikatea, matai, totara, miro, and tawa were the principal forest-trees. The higher portion of the hills and steep spurs are clothed with the various species and variety of birch (beech), to which along the shores of the Sounds were added pukatea and kohekohe, the latter locally called cedar.

Since 1860 sawmills have been at work in various parts of the district. Thirty-two mills have been erected, and have worked for longer or shorter periods. Havelock, on the Pelorus Sound, is at present the headquarters of the timber trade.

The hills along the shores of the Sound will, for many years, furnish birch sleepers. There are other timbers left in places, but nowhere sufficient to justify the erection of a mill, unless pukatea wood, hitherto neglected, could be utilised. It is a light, tough timber, well adapted for boat-building and for packing-cases. The quantity of pine timber remaining in the Kaituna and Onamalutu Valleys is small, but there is a good supply of birch and other wood, suitable for fencing and firewood. On these valleys the Wairau Plain is mainly dependent for timber.

The Pelorus Valley, with its tributaries the Wakamarina, Rai, Ronga, and Opouri Valleys, still contain about 300,000,000 ft. of convertible timbers, exclusive of the birch, of which there is a large amount of the best quality on the hills and terraces. The Wairau, Blenheim, and other districts extending southwards must depend for the future on this source for all their building material.

In the neighbourhood of Kaikoura, along the base of Mount Fyffe, and in the Hapuku Valley, there is another small block of forest land in which three small sawmills have been erected. The quantity of timber suitable for sawmill purposes in this block is very limited, but it will furnish the neighbouring country with firewood and fencing for many years.

Soils and their Uses.

The Wairau Plain, which is the principal block of agricultural land, has been already dealt with. The second agricultural centre is in the neighbourhood of Kaikoura. The land extending along the base of Mount Fyffe, between the Kohai and Hapuku Rivers, about 13,000 acres in extent, is held in small or moderate-sized farms; the soil is good, the block known as "The Swamp," between Mount Fyffe and the Peninsula, being particularly rich. In the Pelorus, Kaituna, and Onamalutu Valleys, and in the Sounds, settlers following in the wake of the sawmills have already converted much of the land worked over into grazing-farms. The land is of three descriptions—alluvial flats, terraces, and hill-sides. On the flats in the larger valleys the soil is rich, producing heavy crops of oats, peas, beans, and potatoes, wherever it has been brought into cultivation. The terrace-land varies much in quality, but generally grows good grass, as do also the hills on which tawa formerly grew; the birch country being very barren. On the small bush-farms cattle-grazing is the chief pursuit. Out of 14,700 head kept in Marlborough, 4,300 belong to the forest country.

Grazing.

About 1,680,000 acres of the Marlborough Land District are at present devoted to keeping sheep. The leaseholds in the northern parts of the district contain a large extent of scrub and fern covered country, now producing little or no food for sheep, but capable of improvement. The total number of sheep depastured is 826,474, distributed as follows amongst the counties into which the land district is divided: Marlborough County, 491,006; Sounds County, 161,057; Kaikoura County, 174,411. On the natural pasture of the open country merino sheep are kept almost exclusively, the land carrying from half to one sheep per acre. In the forest country, on sown grass, the land keeps from two to four crossbred sheep per acre. Along the shores of the Sounds large areas of hill-land have been taken up on lease, and are now being cleared and laid down in grass expressly for keeping sheep, but generally throughout the forest country the holdings are small or of moderate size; hence this is, after the Wairau Plain, the most populous portion of the district.

The export of wool during last year amounted to 12,700 bales.

Industries.

Gold-mining has been carried on for some years, principally at Mahakipawa, Wakamarina, and Wairau Valley. At present not much gold is being obtained.

One dredge is at work in the Wakamarina River, but the two at Top Valley have suspended operations—the returns not being payable—and one of them has been removed to Armchair Creek.

Fifteen sawmills are at work within the district: two at Kaikoura, and the others in the Pelorus, Kaituna, Onamalutu, and Wakamarina Valleys, and in the Pelorus and Queen Charlotte Sounds. The principal one is Messrs. Brownlee and Co.'s, in the Pelorus Valley, their tramway being some fifteen miles long, the output last year being about 3,297,000 ft. Messrs. Brownlee and Co. have sixty men employed, and keep two vessels running between Havelock and Lyttelton.

During the year the phormium industry employed eleven mills, and the quantity of fibre shipped was 5,900 bales and 1,250 bales tow.

There are three flour-mills at work, two of them being owned by Messrs. Redwood Bros. The one at Spring Creek is a complete roller-mill, driven by water-power, and can turn out about 14 tons of flour in twenty-four hours. It is electric lighted, and the sack-working machinery is driven by electric motor. The other two mills are in the Town of Blenheim; one is worked by water-power and the other by steam.

There is a dairy factory at Spring Creek which contains all the latest improvements in machinery; 18 tons of butter were produced in 1903.

There is a first-class cheese-factory at Tuamarina. Last season 60 tons were turned out. There are also cheese-factories at Kaikoura and Havelock. The latter had an output of 52 tons, and that at Kaikoura 104 tons.

Climate.

Marlborough possesses one of the finest climates in the world; and at Blenheim it is fine weather nearly all the year round. There is almost a total absence of the boisterous winds that so frequently visit Wellington.

The original distribution of the open and forest lands was entirely due to climatic causes. At Cape Campbell, one of the barest places in the district, the annual rainfall is only 23·25 in.; in the Pelorus Valley, the centre of the forest country, it is over 65 in. This difference between the climates of the north-western and south-eastern portions of the district explains why the artificial pasture-land, when compared with the natural pasture, supports such a large amount of stock. Winter and spring are the wettest seasons, hence the dry climate is not unfavourable for agriculture. Wherever the soil is suitable, crops sown in winter and harvested in early summer can be successfully grown. Everywhere near the coast the range of temperature, considering the latitude, is very small. The thermometer seldom falls below 30 deg., or rises above 78 deg. Along the shores of the Sounds the mildness of the winter, owing to the curious distribution of land and water, allows lemons, oranges, passion-fruit, figs, and other sub-tropical fruits to be grown in favourable situations. On the lower hills and terraces of the forest country the chestnut (*Castanea vulgaris*) grows rapidly, and commences to bear fruit in five or six years. A few trees planted in the Pelorus Valley some twenty years ago are now yielding annually about 2 cwt. of nuts a tree. In all parts of the low country the common English fruit-trees—apple, plum, pear, cherry, &c.—yield abundantly, the fruit, owing to the clearness of the atmosphere, being of excellent quality. In the high country, where snow falls occasionally during winter, red, white, and black currants can be produced in such quantities that with little labour they might be made an article of export to the warmer parts of Australia.

Towns.

The chief town, Blenheim, is situate on the Wairau Plain, at the junction of the Opawa and Omaka Rivers—a third river, the Taylor, would join at about the same point were it not that when not in flood it disappears beneath the surface, about three miles south of the town. Blenheim has been termed a miniature Christchurch, doubtless from its extreme flatness. Considering this, its streets are not so straight and wide as they should be. The Government Buildings, which comprise the Post and Telegraph Offices, Lands and Survey Offices, Courts of Justice, &c., form a handsome edifice in the centre of the town, which is well planted with deciduous and evergreen trees. It is about eighteen miles and a half from Picton by rail, and about twelve miles from the sea by the Opawa River, which is navigable for small steamers. Blenheim is lit by gas, and is supplied with water principally by artesian wells. The population is 3,300.

The next town in importance is Picton, the principal port, only fifty-three miles by sea from Wellington. This little town, both in position and appearance, may be said to be the antithesis of Blenheim, being most picturesquely situated at the head of Queen Charlotte Sound, and nestling among hills, some of the higher ones still densely covered with birch and other forest. There is frequent communication with Wellington and Nelson by steamers averaging 500 tons, and vessels of large size can lie at the wharf at low-water. The direct exportation of frozen meat from Picton commenced in 1892, when 16,433 carcases were shipped. The Christchurch Meat Company exported from Picton for the year ended 31st March, 1904, mutton, 42,081 carcases, and lambs, 66,216 carcases. Picton possesses a malting establishment also, producing for export, as the excellent quality of the barley grown on the Wairau Plain insures a ready market. A small quantity of oysters, mostly procured in Queen Charlotte Sound, is annually exported from Picton; with culture the supply might be almost indefinitely increased, many of the sheltered bays in both sounds being well adapted for the purpose. What is now being done along the Marlborough coast is a mere trifle compared with what might be accomplished if capital and knowledge were brought to bear on the fishing industry. Around the whole coast, from the mouth of the Conway to near the French Pass, the sea abounds in fish. Within the Sounds and amongst the islands of

Cook Strait, hapuku, snapper, moki, barracouta, raturi, kahawai, and rock-cod are extremely plentiful. Immense shoals of the southern herring (*Clupea sagax*) and of anchovies (*Engranlis encrasicholus*) frequent the inlets at certain seasons of the year, and quantities of fresh fish are exported thence to various places within the colony. As steamers arrive at and leave Picton almost daily, shipments can be made without delay to all parts. Picton possesses a good gravitation water-supply. Its population is about 900 persons.

Havelock, situate at the head of Pelorus Sound, is, as has been already stated, the present headquarters of the timber trade, Messrs. Brownlee and Co.'s steam saw-mill, at the mouth of the Pelorus River, being only a mile or so from the town. Between Picton and Havelock there is a mail-service twice a week, *viâ* Cullensville, on the Mahakipawa Goldfields. The population of Havelock is about 300 persons.

The Town of Kaikoura, the greater part of which is built on a raised shingle-beach, is situate at Kaikoura Peninsula, near the southern boundary of the district. The town, with the adjoining settlement of small farms, forms one of the most picturesque spots in New Zealand, lying as it does under the Seaward Kaikouras, or Looker-on Mountains. At the back of the town the peninsula, which is composed of Cretaceo-Tertiary limestone, rises abruptly for about 100 ft., and affords splendid sites for dwelling-houses. Kaikoura is connected with Blenheim by a bi-weekly coach service, the distance being about ninety-five miles. There is also direct steamer communication with Wellington and Lyttelton. The population of the town is about 500.

Roads and Railways.

The only railway is that between Picton and Seddon, a distance of thirty-three miles and a half. Three trains run daily between Picton and Blenheim, about eighteen miles, and trains twice daily on three days in the week and once daily on the other three days between Blenheim and Seddon. A substantial railway and traffic bridge over the Awatere River, costing £22,500, is a very great boon to the district.

The Main North Road to Nelson, distant seventy-eight miles, is a good metalled road nearly the whole way. It runs up the Wairau Valley from Blenheim for about six miles, crosses the Wairau River into the Kaituna Valley, which it follows as far as Havelock—about twenty-eight miles. It then runs up the Pelorus and Rai Valleys, and ascends by easy gradients to the Brown Saddle, where it crosses the boundary into Nelson. An excellent coach service—probably the best in the colony—has been established for some years, the coach running to and from Nelson on alternate days, covering the distance in eleven hours, and another coach service twice a week has been established between Blenheim and Havelock.

The Main South Road, running over the Taylor Pass into the Awatere Valley, and through the Starborough, Flaxbourne, Kekerangu, and other properties, connects Blenheim with Kaikoura and the south, and is a good road during dry weather, although it might be much improved in places. Since the acquisition of the Starborough Estate by the Government the bulk of the traffic now goes *viâ* the Redwood Pass, as it is a more direct route to the town of Seddon. The portion between the Clarence River — over which a fine bridge was built some years ago—and the Hapuku River runs along the coast under steep and picturesque hills covered with forest. A road to the south of Kaikoura, between the Kahautara and Conway Rivers, is now completed and forms part of the main Cheviot–Kaikoura Road, and, besides its great usefulness in opening up the country through which it passes, will also become a favourite route for tourists, as in many places it passes through most picturesque scenery.

A good road has been formed up the Wairau Valley, passing through the Bankhouse, Erina, Lansdowne, Hillersden, and Birch-hill properties, and connecting with Tophouse, just outside the boundary, distant fifty-six miles from Blenheim. At Tophouse there are an hotel and a telegraph-station, and thence a good road leads to Belgrove, on the Nelson Railway-line.

A coach runs twice a week between Blenheim and Wairau Valley—twenty-five miles—where there are an hotel, a post and telegraph office, and one or two stores.

There is also a good cart-road running up the Awatere River—which it crosses and recrosses several times—as far as Molesworth Station, about seventy miles from Blenheim. Between these points there is a weekly coach and mail service.

There are other minor roads and bridle-tracks throughout the district too numerous to specify.

Crown Lands.

The area of Crown lands at present available for settlement is about 160,000 acres, but of this area 120,000 acres are of very poor quality, being chiefly the summits of high, rugged country. The balance of available area lies principally in the Pelorus, Rai, and Wakamarina Valleys, and in the Sounds, and will doubtless be readily taken up when thrown open for selection.

THE NELSON LAND DISTRICT.

W. G. Murray, Chief Surveyor.

General Physical Features.

The Nelson Land District comprises the north and north-western portion of the Middle Island, the greater part being high and mountainous, and on the western and inland ranges covered with dense forest to the bush-limit, at from 4,000 ft. to 4,500 ft. Cape Farewell, the northernmost point, is situated at the western entrance of Cook Strait, on the south side of which lie Golden or Massacre Bay, and Tasman Bay, more commonly called Blind Bay. The former derives its name from the massacre of a boat's crew belonging to Tasman, who visited it on the occasion of his discovery of New Zealand in 1642. At the head of the latter, which has a depth of fifty-four miles from its entrance, stands the town of Nelson. From Separation Point, on the western side of Blind Bay, a range of mountains from 3,000 ft. to 4,000 ft. in height extends southward to Mount Murchison. It consists of a granitic formation, with slate, limestone, and sandstone belts. From Pelorus Sound, on the east, commences another range—a portion of which is serpentine, forming a mineral belt immediately south of Nelson City. It reaches an elevation of 6,000 ft., and runs in a south-westerly direction to the St. Arnaud Range, terminating in the Spencer Mountains, a large central mass attaining a height of 8,000 ft. above the sea-level. To the westward of the Spencer Ranges and those on the further side of Blind Bay are the Brunner, Lyell, Marine, and Tasman Mountains, from 5,000 ft. to 6,500 ft. in height. Still further westward along the coast are the Paparoa, Buckland Peaks, and Papahaua Mountains, about 4,500 ft. at their highest point, and the Whakamarama Range, extending from Rocks Point to Cape Farewell. There are also a number of isolated mountain-masses here and there through the district.

The inland Spencer Mountains are the source of the principal rivers of the district south of the Buller River, and are thus described by the late Sir Julius von Haast: "On the southern slopes of this wild alpine stack we find the principal sources of the Grey, or Pohaturoa; on its north-east side the sources of the Wairau; on its eastern side those of the Acheron and Clarence; and in the deep recesses of these snow-clad giants those of the Waiau-ua, or Dillon: so we may say that, with the exception of the Takaka and Aorere, which fall into Massacre Bay, the Wangapeka and Motueka, which run into Blind Bay, the Karamea and smaller streams, which reach the sea on the West Coast to the north of the Buller River, all the rivers of any size in the northern part of this island take their rise in this magnificent chain."

Rivers.

The Buller River (Kawatiri) has its source at a point about sixty miles south-west from Nelson, where it flows out of the beautiful alpine lake Rotoiti, lying 1,800 ft. above sea-level at the foot of the lofty St. Arnaud Range. This river breaks through the massive mountain chains of the interior in a transverse or easterly direction, forming, where it receives no tributaries, a succession of magnificent rocky gorges, and, after a course of about one hundred miles, finally discharges its

waters into the ocean on the West Coast. The Gowan River, a tributary, has its source in another exquisite lake, Rotoroa, 1,623 ft. above sea-level. Other tributaries of the Buller are: the Matakitaki, Maruia, Owen, Matiri, and Inangahua, all of which take their rise in the snowy ranges.

Lakes.

The lakes of the district are alpine in character, surrounded by grand mountain and bush scenery. The principal are: Rotoiti, lying east, and Rotoroa south-east, of Mount Murchison; Matiri, to the west of Owen Range, 980 ft. above the sea.

Plains.

The Waimea Plains, near Nelson, with the Lower Motueka, Riwaka, and Takaka Valley lands, formed part of the original settlement of the New Zealand Company, and are occupied mostly by small settlers. Inland are the Tiraumea Plains, 1,100 ft. above sea-level, and the Maruia, 1,300 ft. These are, together, about 30,000 acres in extent. They are surrounded by high mountains heavily timbered, and the land is of only second-rate quality. On the West Coast the level lands are Totara Flat and Ikamatua Plains, Mawhera-iti, and Inangahua Valleys, lying on the eastern flanks of the Paparoa coastal range. There are also open *pakihi* at Addison's Flat, on the south side of the Buller, and low swampy lands on the north side; northward is the heavily timbered country of the special settlement at the mouth of the Karamea.

Forest

The area of the District is estimated at 4,686,000 acres, of which the open land under 2,000 ft. in altitude is, approximately, 915,000 acres; the area of forest-land under 2,000 ft., about 1,382,000 acres; and the open land above that altitude, about 581,000 acres, inclusive of bare mountain summits. The wooded country is estimated at 3,200,000 acres; of this area probably about 900,000 acres is scrub and stunted bush; and of the remainder, not 700,000 acres at the outside would be available for clearing. The timber on the western side consists of red and white pine, matai (or black-pine), totara, kawaka (or cedar), rata, and occasional silver-pine, besides black and red birch (*Fagus fusca*). These varieties are also found, but in smaller areas, on the eastern side, birch preponderating. A large amount of timber is used in the mining industry for props and planking, and throughout the districts generally for shingles, fencing, firewood, sleepers, &c.

Agricultural.

On the Waimea Plains is grown excellent barley, a small quantity of which is exported. Oats and chaff are sent in large amounts to the West Coast and elsewhere. Hops also form one of the chief exports. Wheat, maize, rye, and root-crops of most varieties are grown, and fruit is plentiful. The weekly wage of a farm-labourer is 25s. with board; without board he would receive 7s. a day. Ploughmen can get 25s. per week with board; without, 7s. a day.

Pastoral.

The total area of pastoral lands held under the Crown by 70 tenants on the 31st March, 1904, amounted to 310,520 acres. As the agricultural land is limited, settlers are turning their attention to the timbered mountain-slopes for grazing purposes. These, when the timber is felled and burnt, and the ground sown with suitable grass, will, after three to four years, carry about two sheep to an acre on fair soil, and more on the limestone country. The cost of felling and burning green timber is from 15s. to 20s. per acre; cost of mixed grass-seeds and sowing, about 15s. per acre; and a good paling-fence on ordinary bush lands with double No. 8 wires at top and bottom, with ½ in. palings and 7 in. posts sunk 2 ft. in the ground, can be erected at about 12s. per chain.

Mining.

The western side of the Nelson District was a *terra incognita* till about the year 1863, when gold was first discovered in large quantities. Miners flocked in at first from the other goldfields in New Zealand, then from Australia, California, and other parts of the world, until in 1865 the whole coast-line was peopled from Broken River in the north to Jackson's Bay in the south. Mining, at first altogether alluvial, developed into quartz-reefing, and hydraulic-sluicing of large areas. The agricultural lands about the Grey and Inangahua were taken up and cultivated; and, as mining became a more settled industry, the miners occupied and tilled the non-auriferous alluvial flats in the many valleys: hence at the present time a number of homesteads are scattered throughout the district.

Reefton and its neighbourhood forms one of the chief quartz-mining districts in New Zealand; and the West Coast, including Westland, has produced about 45 per cent. of the total gold raised in the colony. The oldest alluvial field is at Collingwood. Among other minerals found in the district are: silver, copper, chrome, antimony, manganese, and hæmatite. Extensive deposits of coal are found on the West Coast, within the areas of the Grey and Buller Coalfields Reserves. Coal is also found in Collingwood, in Blind Bay, and in West Wanganui Inlet; and there are numerous smaller areas of coal-bearing strata here and there throughout the district. The output from the mines at work within the district during the year ending 31st December, 1903, was 581,489 tons. Copper-ore is found in a serpentine rock-formation near Nelson, but the companies which have worked the ore have not hitherto been successful — the last one, "The Champion," failing from want of sufficient capital. Deposits of chrome-ore are also found here. Silver-ore has been worked in the Collingwood District; and at Parapara, in Blind Bay, there are widespread deposits of hæmatite iron-ore, combined with limestone and coal, waiting only for capital to develop them. It will be readily gathered from the above brief description that mining is the chief industry of the Nelson District. A great many river and beach dredging claims have been taken up, and in many instances a large amount has been expended in the purchase and erection of dredges, and, although this industry has not proved quite so successful as anticipated, yet a large number of dredges are working with fair results.

Sawmilling, &c.

The timber industry in this district has now become an important trade. There are now over forty sawmills working, and during the past year about 12,000,000 ft. of various kinds of wood, principally red and black pine, have been cut in this district for export, and silver-pine has been largely in demand for railway-sleepers for home consumption.

A small industry in phormium fibre is also carried on.

Towns.

The chief town is Nelson, situated at the head of Blind Bay, in 41° 16′ S., and surrounded on all sides, except the north, by mountains reaching an elevation of 3,500 ft. With a mean temperature of 54·8° Fahr. it possesses a climate almost unequalled for its beneficial effects on invalids suffering from pulmonary diseases. There are many picturesque spots in the suburbs, and the city itself, with its cleanly-looking buildings and well-kept gardens, is one of the most charming spots in New Zealand. There is an old-established Boys' College, a Girls' College, and a School of Music, besides Government and other schools. The Anglican Pro-Cathedral, built on the summit of a central hill, memorable as being the site of fortifications erected in the early days of the settlement for defence against an expected attack of the Natives, is a striking feature. The Roman Catholic Church, Convent, and school-buildings cover a large extent of ground. There is also at Stoke, a small village three miles from Nelson, a central Catholic Orphanage, surrounded by grounds of considerable area. There is a good supply of excellent water from a reservoir in the hills at the back of the town, and the streets are well lighted with gas. The several Government departments are housed in one roomy building,

containing a large hall used for Supreme Court sittings and other public purposes. The principal industries are represented by iron foundries, fruit preserving and canning works, breweries, biscuit-factory, coachbuilding, sawmills, and sash and door factories, boot factories, and many other small works. Nelson has a small natural harbour, formed by a boulder-bank running for eight miles parallel to the shore, deep enough at high tide to admit vessels of 1,000 tons burden. It is a port of call for the Union Steamship Company's coastal steamers, and has a small local fleet plying between the West Coast, Blind Bay, Picton, and Wellington. The town is reached from the eastward by a good main road from Marlborough. A railway-line has been constructed up country to the southward for thirty-one miles to Motupiko, passing through the farming villages of Stoke, Richmond (borough), Brightwater, Wakefield, Foxhill, and Belgrove, and is being extended for a further distance of ten miles, crossing the Motueka River by means of a combined railway and traffic bridge, and proceeding up the Tadmor Valley as far as Tadmor Settlement. The section will probably be open for traffic within the year. Leaving for the West Coast by a good main road, the traveller starts from the Motupiko Station on one of Cobb and Co.'s coaches, and proceeding up the Valleys of the Motupiko and Clarke, crosses the Hope Saddle and thence down the Hope Valley to its junction with the Buller, about sixty-seven miles from town. He then enjoys a succession of views of mountain-gorge scenery, and, after traversing a gorge of seventeen miles in length, arrives at the Lyell, 107 miles from his starting-point. This is an alpine township, in a small quartz-mining neighbourhood. Here is a fine lattice-girder bridge, spanning a rocky gorge of the Buller, and springing boldly from a bluff on the northern side. It is about 347 ft. long, two of the spans being 108 ft. and 168 ft. respectively. The roadway is 100 ft. above the river-bed. At 116 miles the junction of the Inangahua with the Buller is reached, the main road continuing to Reefton, with a branch road twenty-eight miles to Westport, which for twelve miles passes through some of the grandest river-gorge scenery in New Zealand.

Westport, the town next in importance to Nelson, is situated at the mouth of the Buller River. The harbour is sheltered from southerly gales by Cape Foulwind and its outlying rocks, and is accessible in nearly all weathers. A large sum has been spent on a system of harbour-works, designed by the late Sir John Coode. Westport is the place of shipment for the coal-mines lying northward as far as the Mokihinui River. The character of this coal for steam purposes stands unrivalled. The long line of coal-staiths and wharves on the northern bank of the river, with a fleet of steam-colliers loading alongside, does not fail at once to impress a visitor with a sense of the importance of the trade. Though much has already been done, yet the industry, from the extent of the coal-bearing strata, is capable of much larger expansion when the necessary capital can be found. The Westport–Mokihinui Mine Railway connects with the mines and conveys the coal to the port. At the foot of the Mount Rochfort plateau, nine miles from Westport, is Waimangaroa, and on the plateau itself is Denniston—both coal-mining villages. The latter, built at an elevation of 1,960 ft., is said to be the highest township in New Zealand. On a clear day it is well worth a visit, for the sake of enjoying the magnificent panoramic view of the southern Alps, which reach their highest point in Mount Cook, 12,349 ft. high, about 100 miles south. South of Westport are the alluvial gold-mining centres of Addison's Flat, Croninville, Nine-mile Beach, and Charleston.

Motueka is a thriving town situate near the mouth of the Motueka River. It is the centre of a considerable agricultural and fruit-growing district. It has two bacon-factories, fruit pulping and canning works, and dairy factory.

From the Inangahua Junction, the main road continues southward through the Inangahua Valley, passing through cultivated lands, which are being gradually won from the heavy bush, and at a distance of 136 miles from Nelson reaches the township of Reefton. Here, as at Westport, are good hotels, and, as in every one of the larger coast towns, a hospital receiving a Government grant-in-aid. This town was the first in New Zealand to be lighted by electricity. Through the Midland Railway extension of the Grey–Brunner line, Reefton is now connected by rail with Greymouth, from whence it is for the most part supplied. The continuation of the

line down the Inangahua Valley is being carried on at present. About two miles inland from Reefton is Black's Point mining township, with several batteries at work in and about the place, a visit to which is generally paid by tourists wishing to see something of the gold-mining industry. Other small mining townships are: Boatman's, Capleston, and Antonio's.

Leaving Reefton by rail, and passing into the Grey Valley through a short tunnel, and by a bridge over the Grey River, Totara Flat is reached, nineteen miles distant. This brings us into the Westland District, to the description of which reference should be made for the journey to Greymouth.

Roads, Tracks, &c.

Situate on the coast, fifty miles north of Westport, is the Karamea Special Settlement, principally settled from the Nelson and Motueka Valley districts. This part of the district contains some excellent but heavily timbered land, and is reached from Westport by a road, connecting with the Westport–Mokihinui Railway at the Mokihinui River. There is a bridle-track, also, connecting with Collingwood and Golden Bay. This track passes along the coast northwards, thence up the Heaphy Valley to the Golden Downs, and down the Aorere Valley to Golden Bay. Here again is another coal-basin, which, though of inferior value to the older deposits on the western side, is likely to become of importance, having at the present time one mine in full work. Another coal-basin exists at West Wanganui and Pakawau.

In the Aorere Valley, of which Collingwood is the port, alluvial mining is still found to be payable, and the country contains some valuable timber in the upper part not yet utilised. Nineteen miles south, in Blind Bay, lies the small port of Waitapu, from which a considerable amount of sawn timber is exported, drawn from the Takaka Valley, and brought down by a steam tramway from the upper mills. From the head of this valley the main road is carried over a pass in the Pikikirunga Range, 3,476 ft. high, through the villages of East and West Takaka, Riwaka, Motueka, and Moutere to the town of Richmond, eight miles from Nelson. Inland are also the villages of Ngatimoti, Dovedale, Tadmor, and Sherry, each the centre of a number of small farms, and all connected by fairly-good dray-roads.

An inland road, partly bridle-track and partly dray-road, has been made from Nelson to Canterbury, by way of Tophouse, Wairau Gorge, Tarndale, Clarence Valley, Jollie's Pass, and the Hanmer Plains. Here there are hot mineral springs, much visited by persons suffering from rheumatism and skin-diseases.

Crown Lands.

About 3,000,000 acres of Crown lands still remain unoccupied in the northern part of the Nelson District; they consist principally of high bush country, with occasional patches of good valley lands, the greater part being classed as second-class land. The area open for selection to date comprises 28,841 acres of surveyed lands, and 242,575 acres unsurveyed lands, of which the location, nature of soil, &c., have been briefly described in the foregoing pages.

THE WESTLAND LAND DISTRICT.

G. J. Roberts, Chief Surveyor.

The Westland District occupies the central portion of the western watershed of the Middle Island, joining Canterbury on the east; its north and south boundaries with Nelson and Otago being the Pororari, Otututu, Grey, and Awarua Rivers. The mean length is 240 miles, and its average width twenty-five miles. The area is 6,086 square miles, composed, for the most part, of the great central snow-clad mountain chain and its out-running ranges, intersected by narrow bush-clad valleys, and subsiding westward into undulating plateaux, river straths, and shelving coasts.

Physical Features—Mountains.

The great dividing range, which constitutes the eastern boundary from the head of the Grey River to Mount Aspiring, presents a magnificent spectacle of snow and ice clad summits, representing every aspect of mountain grandeur—masses of rock protruding from ice and snow; precipices of enormous height, with cascades; drifted expanses of snow-fields, feeding glaciers; cañons and ravined foothills covered to the top with forest.

Rivers.

A few of these lead from the foothills, and are of small volume; the others are snow-fed streams descending from the central range, at first in narrow gorges amongst the mountains, but spreading widely on reaching the sea-board country. They are shallow, shingly streams in winter, but swift and deep in summer. In the northern district all the larger rivers are bridged; and, southward, ferries are placed on all the main streams, which, from the melting of the snow, are practically unfordable from September to January. They will all, more or less, be available for electric-power purposes.

Lakes.

The principal lakes are Lakes Christabel, Hochstetter, Ahaura, Haupiri, Brunner, Poerua, Kanieri, Mahinapua, Ianthe, Rotokino, Whahapo, Mapourika, Paringa, Moeraki, and Ellery, with Saltwater and Okarito Lagoons. These and a considerable number of smaller ones are dotted over the district, all varying in character—mountain tarns; coastal tidal lagoons; shallow reedy sheets; deep mountain-girt waters, all more or less forest-locked, and presenting every form of lacustrine beauty. In conjunction with their effluents they form valuable waterways for light transport to adjacent districts.

Climate.

The climate is equable and temperate, remarkably free from storms and fogs, and immediately after bad weather the clouds roll inland, and there is a prevailing clearness of sky. The rain-bearing winds are mostly from the north-west and north-east. The southerly winter gales usually coat the ranges with snow, which, however, rarely falls below 2,000 ft. The rainfall averages 109·89 in. per annum.

Soils.

The high pastoral uplands have a coating of rich mould, and this continues fairly good down to the heavy timber lands. The alpine forest is readily cleared, and imported grasses grow luxuriantly, cocksfoot being the best, as it withstands fire and frosts. The lower flanks of the mountains hold a thinner soil, which at present hardly pays the heavy labour of felling the bush, while the lower heights are somewhat abrupt and unfitted for cultivation. A margin, varying in width, of fertile slopes and fans fringes the basis of the hills, and having a natural drainage constitutes an area of excellent agricultural land.

The upland soils of the coastal undulations and terraces are light loams of moderate fertility, which rest upon transported gravels, the drifted accumulations of eroded hills. On these plateaux are numerous "*pakihi*," or natural clearings, which are mostly extensive tracts of swampy lands, with a peaty soil, resting on thin layers of impervious clay and non-porous gravels, or, in a few cases, on impacted glacial moraines; these formations all overlying loose drifts. The reclamation of these areas is only a matter of time, as the bulk of them are quite drainable.

Stretches of good alluvium border the rivers, streams, and sea-coast, and form the favourite location to settlers.

Pastoral Lands.

The total area of pastoral lands amounts to 2,002,577 acres, 103,801 of which constitute high mountain grass districts, the balance (1,898,776 acres)

being the ordinary bush-clad country, much of which is quite inaccessible to stock. All over the coastal lands, along the slopes of the lower hills, and in the bottoms of the valleys, large herds of cattle are bred and fattened on the dense undergrowth of the forest. The tussock herbage of the high lands is being gradually used by sheep-farmers, and in the near future these natural pastures will support large flocks.

Agricultural Lands.

The agricultural lands comprise some 219,400 acres of forest and 11,500 acres of open surface, such as swamps, grass-grown river-beds, and fringes, &c. The bulk of these lands, when cleared of bush, grow root-crops, especially turnips, which are much used for fattening purposes. The even and moist temperature encourages the almost uninterrupted growth of grass and clover, which are very luxuriant, and favour stock-raising. Oats are also grown abundantly for local consumption, and for the most part are cut into chaff. Year by year the imports of potatoes, fruits, butter, and fat stock are decreasing, owing to increased local production.

Forests.

Generally speaking the whole of the district is covered with dense forest, from the sea-beach to the grass-grown tops of the high ranges. The varieties of trees differ considerably according to soil and altitude. Kamahi and rata are the chief timbers, very useful for firewood, and, spread over the whole country, constitute an almost inexhaustible supply. Rimu is the chief milling timber, and this also is widely distributed from the sea-board to the interior uplands. Valuable stretches of white-pine belt the low-lying depression of the coastal lands, and the same may be remarked concerning the imperishable silver-pine. Clumps of black-pine of good quality are met with, also rarer patches of marketable totara, while serviceable cedars are scattered along the flanks of the inland ranges and all over the lower hills and plateaux. The approximate area of forest equals 2,183,358 acres, of which a portion carries timber fit for the sawmill; the remainder is chiefly firewood and mining timbers and dwarfed alpine bush.

Sawmilling.

The sawmilling industry has progressed considerably during the year, and the output has been the largest on record. Several new mills have been erected, and extensive sawmill areas acquired all over the northern district. The total output from forty-five mills on endowment reserves, Crown and private lands amounted to 26,000,000 ft.; 857,777 silver-pine sleepers were delivered, besides a considerable quantity of props and paving-blocks for mining purposes. The extension of the railway to Ross will result in all the milling forest at hand being worked. There are experts willing to establish mills, provided milling areas of a size commensurate with the great amount of capital involved, are granted.

Flax-milling.

It may be stated that every available strip of flax in this district has been taken up. Seven flax-mills are now in full working-order, and others are in course of erection. These are scattered all over the coast. The output of fibre has not been large as yet, as most of the mills have only recently commenced operations.

Fully a thousand hands are employed in the sawmilling and flax-milling industries.

Means of Communication.

The district is fairly well provided with means of communication. The railway now extends from Hokitika, *viâ* Greymouth, to Reefton, branching at Stillwater to Otira, near Arthur's Pass. An extension to Ross of the Greymouth–Hokitika line is now in course of construction. Coaches twice a week connect with Canterbury, *viâ* Arthur's Pass, and ply daily between Ross, Hokitika, Kumara, Greymouth, and the neighbouring towns; while once a week a mail is despatched by coach to Okarito, and thence conveyed

on horseback southward to Gillespie's Beach, and once a fortnight to Jackson's Bay. A subsidised steamer runs between Hokitika and the southern ports as far as Jackson's Bay, plying every two months, thus enabling settlers to obtain supplies and to ship their cattle and produce to market. The Government steamer also calls at Big, Jackson's, and Bruce Bays on her quarterly trips from Dunedin. Steamers also trade regularly between Hokitika and Greymouth and other parts of the colony. The Main South Road, which for many miles skirts the foot of the Main Range, has been so greatly improved of late years that the traveller can now ride comfortably and safely, *viâ* Haast Pass, right through into Otago. Numerous bridle-tracks branch from the trunk line to various points, while the large open river-beds likewise give access to the country on either hand. From Jackson's Bay horse-tracks have been made, *viâ* Cascade River and Barn Bay, to open up the southernmost country. Sundry dips and *cols*, varying in height from 1,800 ft. to over 7,000 ft., leading down the central range, have been explored and mapped, and during the summer months are crossed from time to time by experienced mountaineers. Of these depressions the only sub-alpine saddle is Haast Pass, all the others being liable to blocks by winter snows. A coach-road over Arthur's Pass and a horse-track through Haast Pass have been made. Another bridle-road is also in course of construction across Whitcombe's Pass, but between these points no trans-insular road exists. Tracks have also been constructed giving easy access to the Franz Josef and Fox Glaciers, and in the future, as population increases, doubtless tourist and stock tracks will be constructed along many of the intervening routes. From Okarito northward the district is in telegraphic communication with the rest of the colony.

Towns.

Greymouth.—This, the largest town in Westland, containing a population of 4,400, has progressed most remarkably during the last few years. It is situated on the south bank of the Grey River, close to its mouth, and is the main shipping port for northern Westland. Four railway-lines radiate from Greymouth to the State coal-mine, Reefton, Otira, and Hokitika. Extensions of the three last-mentioned lines are in course of construction. The town has a Telephone Exchange, good Public Library, first-class drainage, an abundant water-supply, and is well paved and lighted, the water and gas works belonging to the Corporation. One of the Government railway workshops is located here, and amongst other local industries are a foundry, breweries, sawmills, sash and door factories, furniture manufactories, meat-preserving works, lime and cement works, coachbuilding establishments, &c.

Hokitika.—This town is situated at the north mouth of the Hokitika River, bordering the sea-beach. It contains a population of about 2,000, and is mainly dependent on the adjacent saw and flax mills, farming settlements, and gold-mines. A considerable trade is also done by sea with the miners and settlers in South Westland, for which district it is the shipping port. The town enjoys grand views of Mount Cook and other peaks ; and from the terrace on the town hill the panorama of snow-capped mountains is one of the finest in the world. The town possesses a good library, reading-room, and museum ; it is lit with gas, and has a telephone exchange. It is well laid out, the main streets being 99 ft. wide and very clean. There is a central park, and as the suburban dwellings are surrounded by gardens the town has a very pleasing aspect. A fine clock-tower, with chimes, has been erected in memory of the Westland troopers who fell in the Boer war. The local industries comprise saw and flax mills, sash and door and furniture factories, foundry and engineering shops, coachbuilding, fish cannery, breweries, and coffee and spice works. A very handsome building encloses the High and State Schools.

Brunner.—Picturesquely situated on the banks of the Grey River, seven miles above Greymouth, includes the villages of Dobson, Taylorville, and Wallsend, and contains about 1,500 people. This town is wholly dependent on the adjacent Brunner and Tyneside coal-mines and their allied industries of coke-burning, brick and tile making. The output of these mines and manufactories is sent by rail to Greymouth, where the bulk of it is shipped. The mineral traffic causes this

short branch to be the best-paying railway-line in the colony. Two fine suspension bridges across the Grey River link the townships together, one being a railway and the other a foot bridge.

Kumara.—This compact little town, with its suburbs of Dillmanstown and Larrikins, of 1,120 inhabitants is placed on the skirts of the largest alluvial goldfield in New Zealand. Main roads to Hokitika, Greymouth, and Christchurch radiate from this place, and a fine turnpike of four miles connects it with the railway. The town is finely situated on a high tableland, and enjoys interesting views of mountains and bush-clad plateaux, river, valley and ocean. Hydraulic gold-mining is carried on here on an extensive scale, the greater portion of the water-supply coming many miles from the inland mountains. Large sludge-channels have been made to carry away the tailings. This industry gives employment to a large number of men, and also provides lucrative work for sawmillers and mechanical engineers. It has finely equipped and well-built schools and a hospital.

Ross.—Population, 650. A very picturesque township, situated at the foot of the northern slopes of Mount Greenland, 150 ft. above and one mile distant from the sea. It occupies a very sunny sheltered position, and is famed for fruit and flowers. It is essentially a gold-mining centre, and extensive sluicing is carried on. Right under the town area are various layers of auriferous drifts, partly worked, but at present water-logged. In the near future it is expected that these deep levels will be worked again and the town renew its old prosperity. The completion of the railway from Hokitika will greatly benefit Ross and the surrounding district.

Cobden.—Population, 420. This town is at the northern mouth of the Grey River, and immediately opposite the Borough of Greymouth, to which it is linked by a fine bridge. It is principally occupied by the residences of Greymouth merchants and tradesmen.

Blackball.—Population about 800. A prosperous and rising township, mainly dependent on the splendid coal-mines in its vicinity. A fine railway and traffic bridge is in course of construction over the Grey River, and a branch about two and a half miles long will connect the town with the main line.

In addition to the towns already enumerated, there are many small mining and sawmilling centres, such as Ahaura, Hatter's Terrace, No Town, Stillwater, Kokiri, Nelson Creek, Moana, Nobles, Orwell Creek, Twelve-mile, Stafford, Kanieri, Woodstock, Rimu, Blue Spur, Okarito, Gillespie's, &c. The Town of Runanga has been established in connection with the State coal-mines near Greymouth, which are connected by rail with that town.

Harbours and Ports.

The harbours and ports of Westland are the following:—

Greymouth, twenty-four miles north-east of Hokitika: Extensive harbour-works have been carried out. A breakwater or sea-wall extends some 3,542 ft. seaward from the mouth of the river on the south side, and on the north side 1,125 ft., with internal half-tide training walls, the result being an average depth of water on the bar of 21 ft. at high water, and of from 8 ft. to 16 ft. at low water. Vessels of 1,500 tons can now come alongside the wharf. There is berthage accommodation of 2,030 ft., with a minimum depth of 12 ft. to 16 ft. at low water. The principal exports are gold, coal, coke, and timber. The number of vessels that entered the port during the year 1903 was: 581 steamers, tonnage, 210,585; 42 sailing vessels, tonnage, 5,770: being a total tonnage of 216,355 for the year. The train runs down the wharf, and the coal-trucks, specially made for the purpose, are lifted and emptied into the vessel's hold by means of powerful hydraulic and steam cranes, of which there are six, with capacities of from 1½ tons to 12 tons, so that every encouragement is given to quick despatch. 170,317 tons of coal, 2,030 tons of coke, 1,648 tons of bricks, and 22,069,997 superficial feet of sawn timber, and 116,916 sleepers were exported, and 43,696 tons of general cargo were imported during the year.

Hokitika: Two training walls have been constructed, the one on the north side being about 2,000 ft. long, while that on the south is 677 ft. The bar is of

shifting sand, and the depth at high water varies from 9 ft. to 15 ft., while inside the depth is from 6 ft. to 22 ft. for three-quarters of a mile from the entrance. For ten months out of the twelve the port is usually safe for vessels drawing 8 ft. to 10 ft. of water. The berthage space amounts to 1,000 ft., with from 18 ft. to 22 ft. of water. The principal exports are gold and timber.

Okarito, fifty-five miles south-west of Hokitika: A bar harbour, sometimes completely blocked by a high sandbank thrown up by heavy seas. When open, the entrance is good, with a maximum depth of 10 ft. There is a small jetty about half a mile from the entrance.

Bruce Bay, ninety-five miles south-west of Hokitika: An open roadstead, well sheltered from the south and south-westerly winds by Heretaniwha Point, which juts out fully a mile to the northward. Good anchorage in 18 ft. of water opposite the Green rock, which stands up out of the water. Good boat-landing with above-mentioned winds on a smooth sandy beach.

Paringa River, one hundred and four miles south-west of Hokitika: Open roadstead. Vessels coming in and out should give Harata Reef (off the north head) a wide berth. There is also a sunken reef, awash at low water, in the middle of the Bay, and a dangerous sunken rock just off the south head, two or three chains away, facing a small sandy bay and right abreast of the trig. station. Vessels lie inside and a little to the northward of this rock, about a quarter of a mile from shore, and are quite safe with southerly winds.

Haast River, one hundred and eighteen miles south-west of Hokitika: A constantly shifting bar at entrance, which is nearly opposite and a little to the southward of the Alhambra Rock. This rock stands well out of the water, and vessels entering can go on either side with safety. Average depth of water on bar from 6 ft. to 8 ft.

Okuru and Turnbull Rivers, one hundred and thirty-eight miles south-west of Hokitika: These rivers join just inside the entrance. Good straight channel: average depth, 8 ft. to 10 ft. The port is well sheltered by Open Bay Islands, which lie about three miles away, just opposite the entrance, bearing a trifle west of north. A dangerous reef lies about two miles and a half from the south-west point of the smaller island, and immediately to the north-west of a line drawn from the last-named point to the extreme end of Jackson's Head.

Jackson's Bay, one hundred and fifty-three miles south-west of Hokitika: Good shelter and anchorage open only to north-east, with 12 ft. of water within a few chains of shore. Jackson's Head runs out about one mile and a half in a north-easterly direction from the southern end of the Bay. This is the only ocean harbour on the coast of Westland, and could be converted into a first-class port at comparatively small cost. No doubt Jackson's Bay will eventually form a coal port, as indications of coal are found from the bay to Tauperikaka, a distance of thirty miles. Moreover, the recent discovery of a practicable pass through the Main Range, *via* the Waiatoto and Axius Rivers, will make it in the near future the natural outlet for the Lake Wanaka country.

Big, or Awarua Bay, two hundred miles south-west of Hokitika: At the extreme south-west corner of Westland. An open roadstead, sheltered from east and south-west winds: 24 ft. of water on south side anchorage and 30 ft. on north side, just opposite Crayfish Rock, in a spot sheltered from northerly winds.

Steamers have also in past years entered the Teremakau, Waitaha, Wataroa, Wanganui, Waiatoto, and Arawata Rivers, all of which have bar-entrances. The Cascade River is likewise navigable, though no steamer has as yet been in; and goods and passengers are also landed at the roadsteads of Saltwater, Gillespie's Beach, and Abbey Rocks.

Minerals and Mining.

The District of Westland contains the greatest area of alluvial auriferous ground on the West Coast.

A great mineral belt traverses the outer spurs and valleys of the main range right throughout the whole length of the district; outcrops of serpentine, containing copper in the north and centre and nickel in the far south, show all along the line, which is also indicated in all the deeply-eroded valleys by numerous hot springs.

Specimens of nearly all the known minerals have been discovered in various localities. The Paparoa Range, north of Greymouth, contains many varieties, and will eventually hold a large mining population.

Copper also occurs in the Taipo, Arahura, Toaroha, Whitcombe, Wanganui, and Jackson Valleys, the finest lodes discovered being on the western faces of the Matakitaki Range, near the Haast River, with good seams and beds of coal and limestone adjacent.

Petroleum has been found in the Arnold Valley, and borings are now being made to test and develop what is hoped may be a good oil-bearing basin.

All the Westland rivers carry down more or less gold, but the three great gold-yielding rivers are the Grey, Arahura, and Waiho, the bars and beaches of which appear to be replenished with fresh deposits of the metal after each flood. Every stream in the Grey Valley is auriferous, and the gold-bearing nature of the adjoining gravels is evidenced by the old and new workings which are scattered all over the watershed. Again, if one stands on the summit of Mount Turiwhate, the ancient beds of the Arahura can be easily traced northward to the Kumara and southward to the Rimu diggings. Similarly, the Waiho has in olden times flowed both northward down the present valley of the Okarito River and southward to the Omoeroa River, the lateral terraces in both directions being well defined and gold-bearing.

There are three main gold-bearing deposits in Westland. The first, which may be called riverine leads, run generally westward. These are ancient river-beds, often lying at a considerable elevation, of which the bulk has been washed away, leaving detached portions, as Kumara and Rimu. The second are beach-leads, both those along the present coast-line and others running parallel thereto at distances varying from one quarter to four miles inland, and at levels from a few feet below to a couple of hundred feet above sea-level. The third are extensive masses of gravel, &c., occurring in large isolated patches, as at Bell Hill, Big Dam Hill, Humphrey's Gully, and Bald Hill, north of the Haast. These drifts have all one noticeable peculiarity—namely, that they invariably coat the seaward faces of the hills, and neither gold nor drift is to be found on the inland slopes. Gold-bearing fans from Mount Greenland have been found at different levels on Ross Flat, having probably been deposited in deep water by successive land slides.

Hydraulic mining on a large scale is successfully carried on in various protions of the northern districts, and is rapidly being extended to many other localities. Kanieri Lake is being again utilised, and an abundant quantity of water is now available for the sluicers in the Kanieri Valley. The extension, now being surveyed, of the Humphrey's Gully Water-race to Rimu and Back Creek would develop a very large field. The tapping of the Arahura River will enable the miners at Blue Spur to obtain an unfailing supply of water and command a large area of auriferous country at present unworkable from want of water at a sufficient altitude. A large acreage of alluvial drift has been pegged out as dredging claims. Some companies are at work, with more or less profit. Experts are assured that a large extent of auriferous gravels exists all over the low-lying country which will yield remunerative returns by this new treatment. Undoubtedly great areas of swampy, undrainable, and hitherto unavailable lands will be thoroughly prospected, and it is confidently predicted that valuable finds will be made in such districts. Numerous and costly experiments have been made with dredges of different types in the endeavour to work economically the gold-bearing sands which lie along the sea-beaches for a distance of a hundred and forty miles; but very few have proved a success. A considerable number of miners ("black-sanders") work on some of the beaches, and seem to make a fair living, many of them having been so employed in one neighbourhood for over twenty years.

Gold-bearing quartz has been found throughout the district, the most promising finds being at Paparoa, Mount Alexander, Taipo Range, Browning's Pass, and Cedar Creek. Silver ores, associated with gold, have also been found, notably at Rangitoto.

Coal-mining.

As noted before, great quantities of coal are obtained from the mines at Brunner, and also from the fine seams at Blackball, higher up the Grey Valley. It would appear that the greater portion of the seaward country hereabouts contains practically inexhaustible coal-fields. Extensive seams are now being developed at the State coal-mine, in the Seven-mile Creek Basin, and further along the coast, and on the higher slopes of the Paparoa Range large outcrops are being prospected. This region contains the greater area of coal-bearing strata, but all the way down the coast to Jackson's Bay, wherever the coal-measures have been protected from the scour of the ice-streams of the great glacial period, isolated patches of coal exist; possibly borings would prove the lower coal-beds to be intact under the overlying drifts.

THE CANTERBURY LAND DISTRICT.

THOMAS HUMPHRIES, Chief Surveyor.

Boundaries—Physical Features.

The Land District of Canterbury comprises the central portion of the Middle Island, and lies between the Conway River, Barefell Pass, and Mt. Franklin on the northward; the Spenser Mountains, Travers Peak, Mt. Barron, the Amuri, Hope, and Hurunui Passes, the summit of the Southern Alps, and the western watershed of the River Hopkins and Lake Ohau on the westward; the Rivers Ohau and Waitaki on the southward; and the South Pacific Ocean on the eastward. It lies between south latitudes 42° 5′ and 44° 55′, and east longitudes 169° 45′ and 173° 30′. The length of the district north-east and south-west is about 220 miles; the breadth W.N.W. and E.S.E., from the summit of the Alps to the sea, averages seventy miles. The sea-board has a length of about 300 miles, consisting generally of low-lying beaches, broken by the projection eastward of Banks Peninsula, which contains the only large natural harbours. That portion of the district which fronts the ocean between the Ashley and Opihi Rivers is flat land, about 2,500,000 acres in extent; north and south of those limits the plain is interspersed with undulating and hilly country. This great plain stretches westwards, rising and merging into downs and hills, which again extend westward and merge into the Southern Alps and the offshoots therefrom. Banks Peninsula, which has an area of about 250,000 acres, is wholly composed of ridges and hills, deeply intersected by basins and gullies, the result of volcanic action.

The Southern Alps, which form the backbone of the island, are a continuous chain of mountains, with a succession of magnificent peaks, attaining their culminating point in Mount Cook, or Aorangi, 12,349 ft. above sea-level; there are, besides, numerous peaks ranging in altitude between 7,000 ft. and 10,000 ft. Offshoots, extending to great distances eastward and south-eastward from the main range, attain elevations of 6,000 ft. to 9,000 ft. On these mountain-ranges are numerous and extensive glaciers, from which emanates the river-system of the district, comprising the Waiau-ua, about 100 miles in length; Hurunui, 85 miles; Waimakariri, 90 miles; Rakaia, 85 miles; Ashburton, 64 miles; Rangitata, 74 miles; the Waitaki and its main feeders, 140 miles. These rivers rush down from the mountain-gorges, through the intervening ranges and hills, and traverse the plains to the sea. The channels on the plains are shallow, and extend in some instances over a mile in width.

These rivers serve as outlets for a portion of the Lake system of the Middle Island, Lake Sumner being connected with the Hurunui, Lakes Coleridge and Heron with the Rakaia, and the Mackenzie Country lakes—Tekapo, Pukaki, and Ohau—with the Waitaki. Another important lake is that known as Lake Ellesmere, west of Banks Peninsula; it is separated from the ocean by a narrow shingle-spit only 5 chains across at one point, through which, at certain seasons, the flood waters force a channel to the sea. Lake Tennyson is situated on the eastern flank of the Spenser Mountains, 3,614 ft. above sea-level.

Climate.

The climate of Canterbury is well suited to Europeans. It resembles that of Great Britain, but on the plains is far more equable, the mean daily range of temperature being 17·10° Fahr. Observations taken at Lincoln (fourteen miles from Christchurch) for a period of twenty-one years, ending December, 1903, give the following results: Barometer, reduced to 32° Fahr. and sea-level, 29·968 in.; mean maximum daily temperature, 61·8°; mean minimum daily temperature, 43·1°; mean average temperature, 52·4°. The extremes of temperature were 98·4° and 19·9° Fahr. The rainfall for the same period averaged 24·674 in. per annum, the extremes being 35·287 in. in 1886 and 14·480 in. in 1897. The average annual number of days on which rain fell was 123, the extremes being 154 in 1902 and 98 in 1891. Snowfalls are very light on the plains, but in the high uplands the climate is much colder and more severe. The changes of weather and temperature are sudden, calms and gales, rain and sunshine, heat and cold alternating. The prevailing winds are north-east, south-west, and north-west—the last a hot wind. The climate, as a whole, is splendidly healthy, bracing, and most enjoyable.

Foundation and Settlement.

The district was occupied, in the first instance, by settlers sent out by the Canterbury Association, which was formed in 1848, and incorporated by Royal Charter in 1849, under the auspices of prominent men in England, including the Archbishop of Canterbury and Lord Lyttelton. The step was not taken until after due inquiry as to the most suitable part in which to establish a settlement. Captain (afterwards Sir George) Grey, at that time Governor, recommended the Wairarapa, but it was finally decided to take over from the New Zealand Company a tract of the Canterbury Plains, in the neighbourhood of Port Cooper. Captain Thomas, the agent of the association, who had advised the selection, superintended the surveys and the preparations for receiving intending settlers. The original intention of the founders was that the settlement should be independent and complete in itself, and should embrace only such persons as were members of the Church of England and were approved of by the association. This was frustrated by the influx of numbers of persons of all classes and beliefs. The first body of emigrants arrived at Port Cooper on the 16th December, 1850, and the settlement remained under the control of the association, as directed by a committee of management in England, and under the active personal supervision of Mr. John Robert Godley, until 1853, when the whole of Canterbury became a province of New Zealand by the provisions of "The Constitution Act, 1852."

Thenceforward the control of the settlement was vested in the Superintendent and the Provincial Council. The first Superintendent was Mr. James Edward FitzGerald, who held office till 1857; he was followed in succession by Mr. William Sefton Moorhouse, 1857–1863; Mr. Samuel Bealey, 1863–1866; Mr. Moorhouse again till 1868; and Mr. William Rolleston till the abolition of the provinces in 1876, when the district came directly under the control of the General Government.

Internal Communication.

In no part of New Zealand are the means of communication better than in Canterbury. The natural facilities of the country have been abundantly supplemented by railways and roads. Lyttelton, the chief port, is connected by rail with Christchurch, the heart and centre of the whole district. From Christchurch the main line extends northwards to Culverden, a distance of 69 miles, with a branch from Waipara to Scargill (about fifteen miles) open for traffic. It is proposed to extend this branch to Mackenzie, in the Cheviot District, and the work is now actively in progress. An extension of the main line from Culverden to Hanmer Springs is also in contemplation. Southward the main trunk line runs through Waitaki (139 miles) to Dunedin. These lines tap and serve the whole coastal district and the lands adjoining on the western side. In addition, eight branch lines have been constructed westward, and two lines south-eastward; the former, in most instances, extending to the foot of the hills.

Combined with the railway system is a complete network of main, district, and subsidiary roads, extending into all parts of Canterbury. The total length of railways is 467 miles, and the roads probably exceed 10,000 miles in the aggregate. The completion of this splendid system is due, partly to the foresight of the original settlers, partly to the exertions of the Provincial Government, and partly to the railway and public-works policy of the late Sir Julius Vogel.

Geological Formation.

According to Sir James Hector, the main western ranges are composed of Upper Palæozoic rocks, having at their base extensive plains of Tertiary fluviatile formation, with occasional protruding ridges of Upper Mesozoic, forming low mountain-ranges subordinate to the main axis. Banks Peninsula consists of basic volcanic rocks.

Area, Nature, and Disposition of Lands.

The area of the Canterbury Land District is 9,604,045 acres, of which the estimated area of forest land is 516,030 acres. Forest lands are found in Banks Peninsula and in the Mount Peel and Waimate districts, where the timber consists chiefly of rimu, totara, and matai; at the sources of the Waiau-ua, Ashley, Waimakariri, Rakaia, and Hopkins Rivers, at Lakes Ohau and Sumner, and near Springfield and Methven, the timber in these localities being mostly native beech; and near Oxford, where the beech is interspersed with rimu, totara, matai, &c.

The lands of Canterbury may be classed approximately as follows: First class, 2,046,071 acres; second class, 5,207,173 acres; third class (barren lands and lands of small value), 2,350,801 acres: total, 9,604,045 acres.

The disposition of lands was in 1904 as follows:—	No. of Holders.	Area in Acres.
1. Crown lands disposed of for cash (including land granted under Midland Railway Act, 572,000 acres, but deducting lands repurchased for settlement—246,006 acres) ...	...	3,856,034
2. Lands held on deferred payments	19	11,200
3. Lands held on perpetual lease	70	3,923
4. Lands held as leaseholds in perpetuity	1,461	271,712
5. Lands held in occupation with right of purchase ...	37	4,932
6. Lands held as village-homestead special settlements ...	408	12,447
7. Lands held as small grazing-runs	94	200,747
8. Lands held as grazing-farms (on Cheviot Estate) ...	48	45,978
9. Pastoral licenses	151	3,528,893
10. Special-settlement associations	41	4,651
11. Reserves and Crown lands held under temporary occupation licenses (area, 96,636 acres, included in 12 and 16)	684	...
12. Area of land reserved and granted under various Acts (exclusive of Midland Railway land, included in 1) ...	...	970,797
13. Land purchased and disposed of under Land for Settlements Acts (included in 4, 7, 10, and 11; 1,107 holders, 242,587 acres)	...	...
14. Crown lands open for selection	...	3,970
15. Crown lands being prepared for selection	...	...
16. Barren lands, and lands for future disposal	...	688,761
Total	3,013	9,604,045

In explanation, it may be noted that No. 1 comprises the freehold lands conveyed, and that tenants of Nos. 2, 3, and 5 have the right of acquiring the freehold, which is not the case with tenants of Nos. 4, 6, 7, 8, 9, 10, 12, and 13. Crown lands proper are: 14, open for selection; 15, being prepared for selection.

Soils.

The Southern Alps and mountains adjoining are, owing to their great altitude, subject to disintegration, and form for the most part rocky barren wastes.

The lower ranges and hills, the high tablelands, and the light stony portions of the plain form the pastoral areas.

In the northern and southern districts and in the great central plain are the agricultural areas. This latter class of land comprises rich alluvial tracts about Cheviot, Rangiora, Kaiapoi, Lincoln, Ellesmere, Longbeach, Temuka, and Waimate, and the splendid plain and down lands which extend from Cheviot to the Waitaki.

Banks Peninsula, where the soil is of a rich volcanic nature, though exceedingly hilly, has alluvial areas in the valleys and about the bays.

Pasturage and Crops.

Below a certain level, the mountainous and hilly regions, and the high upland country in the western and northern part, are covered by native grasses, with an admixture of English forage-plants where the character of the soil and other circumstances are favourable.

The pasturage, which is very suitable for sheep-farming, is taken full advantage of by the pastoral tenants of the Crown, and is used to some extent by freeholders. The light stony portions of the plain also contain native grass lands, well adapted to merino sheep.

The lower hills, downs, and better kinds of plain-country have been widely cultivated, and have proved well fitted for the production both of cereals and of grasses.

The chief crops grown in Canterbury District are wheat, oats, barley, turnips, rape, clover and grass seed; while amongst other crops produced are rye, peas, beans, mangolds, beet, carrots, and potatoes.

Of the cereals, wheat is the most largely grown, and was for many years a large item of export. In the season 1903–1904 the area under crop for threshing was 159,361 acres, being over two-thirds of the total wheat-area of the colony. The total yield was 5,459,218 bushels, being an average of 34·26 bushels per acre.

Oats also are very successfully grown, the figures for the same period being 164,332 acres, or about five-twelfths of the total area of this crop in the colony. The total yield was 6,378,362 bushels, being an average of 38·81 bushels per acre.

Barley of superior quality is also produced, the figures being 12,548 acres, equal to over one-third of the total area of barley-crop in the colony. The total yield was 481,966 bushels, being an average of 38·40 bushels per acre.

Grass-seeds are abundantly grown, cocksfoot mainly on the splendid Banks Peninsula country, and ryegrass throughout the land district.

Potatoes, which yield crops of excellent quality, were grown in 1903–1904 on 9,339 acres; turnips and rape were grown on 197,799 acres, and the combined area of other crops grown, including rye, peas, beans, mangolds, beet, carrots, and onions, was 15,874 acres. The area of wheat, oats, and barley for fodder was 56,360 acres. The area ploughed and laid down in English grasses was 1,542,128 acres. Surface-sown lands comprised 457,711 acres. The total area under crop was 615,613 acres, and the area broken up but not in crop, 14,653 acres. Plantations, exclusive of private gardens, occupied an area of 23,358 acres. The aggregate area of private and market gardens, orchards, and vineyards over quarter of an acre in extent was 8,248 acres.

Stock.

The pastoral and agricultural lands provide grazing and fodder for a large number of sheep, cattle, horses, and other stock. Of late years the value of the plains has been much enhanced and the carrying-capacity thereof greatly increased by the water-race system, which supplies water throughout the length and breadth of the dry areas, and enables the country to be occupied in smaller holdings than would otherwise be possible.

The following table shows the extent, cost, and other particulars regarding the water-race system in the several counties in 1904:—

County.	Area watered.	Miles of Races.	Total Cost.	Cost per Acre watered.	Amount of Water distributed every Twenty-four Hours.	Annual Charge for Use of Water.
	Acres.		£	s. d.	Gal.	
Amuri ...	24,162	54	4,800	3 11⅔	...	Races are maintained by an annual charge in proportion to area watered.
Ashley ...	122,000	500	25,000	4 1	27,000,000	From ¾d. to 6d. per acre, in addition to special rates for interest on loans.
Selwyn ...	326,888	1,132	79,307	4 10	90,940,960	8s. 4d. to £1 6s. 6d. per 100 acres.
Ashburton	586,000	1,360	43,620	1 5⅞	86,000,000	From £2 to £3 per mile of race.
Geraldine	71,212	260	9,010	2 6½	29,520,000	About 7d. per acre, including a rate for payment of principal and interest on loans, and a rate for maintenance.
Levels ...	19,000	71	5,500	5 9½	6,480,000	1½d. per acre, and on part of area an interest-rate of ¼d. in the pound on capital-value.
Mackenzie	9,400	35	1,935	4 1½	7,516,800	2 11/16d. per acre on part of district and ⅝d. in the pound on capital value in remainder of district.
Waimate	35,700	157	8,125	4 7	8,500,000	Races are maintained by an annual charge on the value of lands watered.

The sheep in the District of Canterbury, in April, 1903, numbered 4,745,025. In October, 1903, there were 55,649 horses, 126,350 cattle, and 44,098 pigs.

The district has a well-deserved reputation for the classes and splendid quality of its sheep. On the mountains and higher lands the merino still predominates; but on the richer low-lying ranges, hills, and plains the prevailing types are crosses between the merino and Leicester, Lincoln, Romney Marsh, and other breeds. In proof of the superior character of the flocks, pasturage, and climatic conditions in the Middle Island, the following percentages of lambing returns are quoted—these are "fair average returns, but much higher might have been exhibited": Mountain native pasture—pure merino, 75·36; pure merino and Border Leicester, 88·94: English-grass pasture—crossbred and Border Leicester, 80·8; half-bred Border Leicester, 82·79; Border Leicester, 90·77; Lincoln, 88·08; Romney Marsh, 111·46; English Leicester, 93·34; Shropshire, 97·41; Southdowns, 96·87. It must be borne in mind that the flocks and herds are supported by the natural and artificial pastures without housing.

Owing to the development of the frozen-meat trade a great impetus has been given to sheep-breeding. The bulk of the primest meat exported from the colony is supplied by this district, with Marlborough, and commands the highest price in the London markets. In the year ended 31st December, 1903, the number of carcases frozen was 2,014,481, valued at £1,360,749. There were also produced 14,983 cases of preserved meats, 12,098 casks of tallow, 8,846 tons of bonedust and manures, besides neatsfoot-oil, oleo, &c.

The frozen meat exported from Canterbury during the year ended 31st March, 1904, was valued at £1,120,552. At Belfast, Fairfield (near Ashburton), Islington, and Timaru, freezing-works are established, each containing a complete plant for carrying on the industry, as well as departments for curing, preserving, boiling-down, tallow rendering, fellmongering, and the manufacture of manures. The Belfast Freezing Works, owned by the Canterbury Frozen Meat and Dairy Produce Export Company, contain engines of 710-horse-power, and employ 300 men. They have storage for 90,000 carcases, and can put through 5,500 carcases in a day. The same company has a factory at Fairfield (near Ashburton), where 65,000 carcases can be stored and 4,500 dealt with in a day, and has recently erected a factory at Pareora, near Timaru, which has storage for 100,000 carcases, and can deal with 5,000 in a day. The Islington and Timaru works, which are owned by the Christchurch Meat Company, employ in all about 750 men, and have engines representing 403 horse-power. The former can put through 8,000 carcases per diem, and have storage for 140,000 carcases. The latter can deal with 6,000 carcases in a day, and have storage for 100,000 carcases. At Hornby there has been established by Messrs. Nelson Brothers (Limited) a well-equipped factory for freezing only, with engines of 300 horse-power, and a capacity of dealing with 1,000 sheep per diem. The factory has storage-room for 50,000 sheep, but is not now in operation.

Wool.

During the year ended 31st March, 1904, there were shipped at Lyttelton and Timaru 35,705,495 lb. wool, valued at £1,177,190; and to this must be added the amount (about 1,200,000 lb.), bought for manufacture by the woollen-mills in the district. The Kaiapoi Woollen Manufacturing Company, Limited, owns large woollen mills at Kaiapoi, and clothing factories at Christchurch. These are fitted with modern machinery and appliances, and the company's products have obtained a considerable reputation. The company employs about 980 hands, and uses about £40,000 worth of wool and £6,100 worth of other colonial products in a year. The staple of the New Zealand wool, especially the long-wool and cross-bred, is remarkable for its freedom from breaks and other imperfections. The average clips are approximately as follows: Merino, 4 lb. to 7 lb.; quarter-breds, 6½ lb.; half-breds, 7½ lb.; three-quarters, 8½ lb.; Leicesters, 10½ lb.; Lincoln, 11 lb. From special flocks clips up to 25 lb. and 30 lb. are obtained.

Butter and Cheese.

Banks Peninsula and the rich tracts of country previously mentioned are excellently suited for dairy farming. The pasturage and climatic conditions are favourable, and a great increase in the production of butter and cheese may be looked for, more especially as housing and hand-feeding are in some districts unnecessary. A central co-operative dairy factory has been established at Addington, served by twelve creameries, situate at Marshlands, Oxford, Halswell, Springston, Doyleston, Little River, Ladbrooks, Lakeside, Kaiapoi, Green Park, Brookside, and Ashburton, each capable of dealing with the milk of 1,000 cows. There are also very complete dairy factories at Taitapu, Sefton, Cheviot, Timaru, Temuka, Southbrook, Belfast, Tinwald, and Le Bon's Bay, as well as cheese-factories at Flemington and German Bay. The number of cheese and butter factories in the district in 1903 was 15, and of creameries 32; the output of butter and cheese amounted to 3,384,640 lb.

Timber.

The sawmilling industry finds its development chiefly in the Oxford, Little River, Mount Somers, and Waimate districts. The number of mills in Canterbury in 1901 was eighteen, employing 260 hands, the horse-power being 317. The output in 1900 was 4,714,959 ft., valued at £22,277. The number is, however, diminishing, owing to the working-out of the available timber. The timber comprises birch, totara, red and white pine. The first-named is used chiefly for sleepers and fencing, the totara and pine for building purposes. Including the work done by the planing and moulding mills the value of all the manufactures under this head was £45,866.

Fruit.

The district is eminently adapted for the growth of a large variety of fruits, especially all that flourish in Great Britain. Attention has recently been directed to landing supplies of fruit in London; the attempts so far have proved satisfactory, and point to the possibility of a large trade being established.

Coal.

Brown coal is found at the Malvern Hills, Homebush, Whitecliffs, Springfield, Mount Somers, Albury, and various other places. Lignite is also commonly distributed. For the year 1903, the output from 15 collieries, employing about 70 hands, was 23,527 tons, bringing the total amount raised from 26 collieries up to the 31st December, 1903, to 453,113 tons. The seams worked vary from 16 ft. to 2 ft. 3 in., the average width being 8 ft. At Acheron, near Lake Coleridge, a true anthracite is found, the other pits in the district being of brown coal or lignite.

Building-stones.

The building-stones of Canterbury comprise some excellent varieties. The Halswell quarries produce an exceedingly hard and close-grained stone of a dull leaden-grey colour. Granular trachytes are obtained from Governor's Bay, Lyttelton; porphyrites at Malvern Hills; good limestone at Malvern Hills, Waikari, Mount Somers, and various other places; bluestone rock is found at Timaru suitable for millstones. There is abundance of limestone in North Canterbury, Mount Somers, Castle Hill, and various other parts, which is well adapted for making lime.

Fisheries.

Deep-sea fishing is carried on from Lyttelton and Akaroa, the kinds of fish chiefly caught being groper (hapuku), ling, conger eels, moki, butterfish, barracouta, soles, whiting, red-cod, herrings, and garfish. From Lake Ellesmere and the river estuaries excellent flounders are obtained.

Trout thrive amazingly in the rivers and fresh-water lakes, affording excellent sport.

Manufactories.

Excluding mines and quarries, the total number of manufactories in Canterbury at the date of the census in 1901 was 648, employing 7,050 males and 2,754 females.

Included in the above were 35 printing, 10 agricultural-implement, 26 coach building and painting, 29 fellmongering, tanning, currying, and wool-scouring establishments, 5 sail and oilskin factories, 27 boot and shoe factories, 7 rope and twine works, 8 flax-mills, 4 boiling-down, meat-preserving, and freezing works, 10 bacon-curing works, 17 cheese and butter factories, 23 grain-mills, 34 chaff-cutting and grass-seed-dressing works, 16 breweries, 10 malt-houses, 27 aerated waters and cordial works, 4 sauce and pickle making factories, 6 soap and candle works, 18 sawmills and sash-and-door factories, 4 gasworks, 20 brick, tile, and pottery manufactories, 14 iron and brass foundries, 25 cycle-works, 20 furniture-factories, and 8 engineering-works.

The census returns also showed that in 1900, the value of land, machinery, and buildings used for factory purposes was £1,489,096, and the total value of manufactures £4,701,304.

Educational Institutions.

Primary Schools.—The district is divided into two parts, termed North and South Canterbury, each presided over by an Educational Board. Under the control of the Boards schools have been established throughout the whole country wherever population warrants their erection.

The number of children attending the public primary schools in Canterbury, on 31st March, 1904, was 24,626. Average daily attendance, 21,007. Number of teachers—males, 248; females, 393: total, 641. Number of schools, 280.

There is a Normal School at Christchurch for the training of teachers.

Secondary Education.—For the further education of children ample provision has been made by the establishment of secondary schools. The principal schools of this class are the Boys' and Girls' High Schools at Christchurch, Rangiora, Ashburton, and Timaru. For more advanced students Canterbury College, Christchurch, is available. This institution was founded and endowed by the Provincial Government in 1873. It is presided over by a Board of Governors. The teaching staff comprises twelve professors and lecturers, and the number of students attending lectures is 249. The School of Engineering, Electricity, and Technical Science, recently established as a special branch of the college, is well equipped, and is attended by a large number of students. The School of Art is also a special branch of the college work, and the popularity of both these branches has been met by the recent erection of considerable additions to the building accommodation.

It should be recorded here that the Provincial Government of Canterbury was fully alive to its duties as regards higher education. It made reserves for the purpose of endowment for the following objects: (1) College, 101,640 acres, reserved June, 1873; (2) technical science, 103,000 acres, reserved July, 1873; (3) School of Agriculture, 100,950 acres, reserved June, 1873; (4) Boys' High School, 9,220 acres, reserved at various dates; (5) Classical School, 8,953 acres, reserved at various dates. To these were subsequently added the following: (6) Girls' High School, 2,578 acres, reserved January, 1878; (7) Medical School, 5,000 acres, reserved December, 1877.

In April, 1903, there was established in Christchurch a technical school, administered by a local Board of Management, and embracing continuation, commercial, and technical classes. The school commenced with 8 classes and 66 students, and at the end of twelve months had developed to include 31 classes, with 924 students and 20 instructors. The fees vary from 3s. 6d. per term for continuation classes to 15s. per term for commercial and practical classes, and the revenue of the school is supplemented by contributions from various public and local bodies asisted by Government subsidy and capitation.

Private Schools.—There are numerous private schools, independent of the State, the chief amongst them being Christ's College, Christchurch, connected with the Church of England. The Roman Catholics support schools of their own in Christchurch, Pleasant Point, Lyttelton, Timaru, Addington, Papanui, Ashburton, Akaroa, Rangiora, Sheffield, Temuka, Leeston, and Waimate. There are besides, in Christchurch, some excellent private boarding and day schools for both boys and girls.

Other Institutions.

Canterbury has the advantage of possessing many flourishing public institutions. The School of Art, Christchurch, was established by the College Governors in 1882; the Art Gallery owes its origin to the Art Society, the site being the gift of the Government. The Canterbury Agricultural College, Lincoln, also founded by the College Governors, is surrounded by 660 acres of land. The commodious buildings, which cost over £20,000, provide accommodation for the Director and teaching-staff, and for forty-five students. The fees are on a low scale. The farm buildings are complete, and include a well-equipped dairy. Instruction is given in agriculture, chemistry, botany, mechanics, physics, surveying, &c.

The Public Library, Christchurch, under the control of the College Governors, contains reading-rooms, a circulating library of 22,447 books, and a reference library of 15,164 volumes. One hundred and seventy-one magazines and newspapers are provided. The number of subscribers is 1,844, and the average daily attendance 1,000. A spacious free reading-room, 60 ft. by 36 ft., has recently been erected, and is supplied with 127 English, American, and colonial newspapers and periodicals.

The Museum, Christchurch, is a handsome pile of stone buildings; the collections are large and varied. They are separated into two groups: (1) Those from New Zealand; (2) those from foreign countries. In the New Zealand department the skeletons of whales and moas, as well as the collections of shells (tertiary and fossils) and rocks, are specially good; and the Maori collection, exhibited in a Maori

house, is also of considerable interest. In the foreign department, the geological, mineralogical, and ethnological collections are the most extensive, but there is also a good illustrative series of Egyptian and Roman antiquities, as well as of the remains of prehistoric man in Europe and America.

This institution owes its origin and success to the foresight, skill, and energy of the late Sir Julius von Haast, and to the munificence of the Provincial Government.

The philanthropic institutions embrace the Christchurch, Akaroa, Ashburton, Timaru, and Waimate Hospitals; the Sunnyside Asylum for the Insane; the Rhodes Convalescent Home; the Memorial Home for the Aged at Woolston; the City Mission and Destitute Men's Home, Christchurch; the Deaf-and-Dumb Asylum at Sumner; the Orphanage, Lyttelton; the Industrial School at Burnham; and the Mount Magdala Asylum, Samaritan Home, and St. Mary's Home, in the vicinity of Christchurch.

Towns.

Christchurch, the capital city of the Canterbury District, is situated on the plains. It is practically level, the original portion of the city being laid out in rectangular form, two miles by one mile and a quarter, and intersected diagonally by a street. All the principal streets are 66 ft. in width. There are numerous open spaces, including the Cathedral Square in the centre, and Cranmer and Latimer Squares. The Avon, a pretty stream, overhung by willows, runs through the town, presenting from all points charming vistas. The city is surprisingly English in its appearance, architecture, and surroundings. The central portion, where stands the Cathedral, Government offices, and other substantial structures, has a handsome, well-built look. Other parts contain fine public buildings, such as the Museum, Canterbury College, High Schools, &c. The whole is admirably set off by Hagley Park, 400 acres in extent, the Domain and Botanical Gardens, 79 acres, Lancaster Park, the Town Belts, and other public and private gardens and plantations. The suburbs can show many handsome houses and beautifully kept grounds.

On the 1st April, 1903, the suburbs of Sydenham, Linwood, and St. Albans were amalgamated with the original city proper into what is known as "Greater Christchurch," comprising a total population of about 49,000. Including the adjacent Borough of Woolston, and the suburbs of Papanui, Fendalton, Riccarton, &c., the total population amounted to about 57,000 at the time of the census in 1901. Tramways connect the centre of the city with the outlying areas of Addington, Sydenham, the Port Hills, and Papanui, and with the seaside villages of New Brighton and Sumner. The city has been drained at considerable expense, the sewage being conveyed three miles and discharged on the sand wastes near the sea. A pure and copious water-supply has been provided by nature, and is obtained by artesian wells. For the purposes of municipal government the city is divided into four wards, and its affairs are controlled by the City Council, presided over by the Mayor. Christchurch is the centre of trade and commerce for the North Canterbury agricultural and pastoral country, and the headquarters of many manufacturing industries, including carriage, boot, and clothing factories, flour-mills, breweries, meat preserving and freezing, biscuit, planing and moulding, bicycle, and other works.

There are large and well-equipped show-grounds at Addington.

The Canterbury Agricultural and Pastoral Association and the Industrial Association, operating through a public company, have erected a fine block of buildings in brick and stone, comprising a large hall capable of seating three thousand persons (and known as the Canterbury Hall), together with smaller halls and suites of offices. It is proposed to establish an industrial and agricultural museum of a permanent character in the building, which should form a most useful reference to the productions and capabilities of the district. The opening of the building was inaugurated by the holding of the "Canterbury Jubilee Industrial Exhibition, 1900," commemorating the establishment of the province fifty years before, and forming an excellent index to the progress of the district since that time. The exhibition was confined to colonial products, but the bulk of the exhibits were produced in the district. It remained open for three months—from the 1st

November, 1900, to the 31st January, 1901—was visited during that time by about 250,000 persons, and yielded a profit to the Industrial Association (as promoters) of about £3,000.

Recreation and amusement are provided for by the Canterbury Hall (already referred to), Theatre Royal, Opera House, and various public halls, the famous Riccarton racecourse, the numerous cricket and football grounds, &c., while boating men have the River Avon and the Heathcote estuary.

Christchurch is connected with the outside world by Port Lyttelton, seven miles distant. The railway-tunnel of 1⅛ miles in length, through the Port Hills, is on this line. Christchurch is not only the centre of the splendid Canterbury Plains, but is also one of the chief railway centres of the colony. Addington railway-workshops are extensive and fully equipped.

Lyttelton, the chief port of the district, is situated on the northern shores of the inlet of that name, sometimes called Port Cooper. The surrounding country consists of high precipitous hills, which separate the harbour from Christchurch and the plains; but by the construction of the railway and tunnel the natural difficulties have been overcome, with the result that the whole of the imports and exports of northern and central Canterbury pass through Lyttelton. The origination and accomplishment of this great engineering work is due to the late William Sefton Moorhouse, at that time Superintendent of the Province. The natural advantages of the port have been enhanced by reclamation and harbour-works, which include two breakwaters, 2,010 ft. and 1,400 ft. in length respectively, extending from Officer and Naval Points, enclosing about 107 acres; long lengths of wharf accommodation, 10,041 ft.; a patent slip for ships up to 400 tons; and a splendid graving dock 450 ft. long, width on top and bottom 82 ft. and 46 ft. respectively, the entrance being 62 ft. wide, well equipped with machinery and all requisites for repairs. Ships drawing up to 25 ft. can berth alongside the spacious wharves and sheds. The railway, electric-light, machinery, and appliances are available throughout, which renders loading and unloading practicable both by day and by night. As an indication of the volume of trade dealt with at the port, it may be noted that for the year ended March 31, 1904, the imports were valued at £2,194,430 and the exports at £2,412,687. The town is built on the side of the range, the streets being generally steep, flanked by solid stone buildings; and a background of green spurs and bold rocky faces gives completeness to the whole appearance. The water-supply is obtained from artesian wells on the Christchurch side of the hills. To Christchurch there is a bridle-track over the range, and a carriage-road *viâ* Sumner. The harbour is well defended by fortifications and batteries on Ripa Island and the mainland. The population at last census was 4,023 persons.

Timaru, the third town in importance, is situated on the coast and railway-line between Christchurch (100 miles) and Dunedin (131 miles). The boundaries of this borough were extended in 1898, the estimated area, including town belt, being now 1,100 acres. It has a well-constructed artificial harbour, the port of shipment for the agricultural and pastoral districts of Geraldine, Timaru, and Waimate. The harbour is enclosed by a breakwater built of blocks of concrete; a rubble wall—the North Mole—starts from the shore a quarter of a mile away to the north, and extends easterly to a point 350 ft. from the breakwater. The enclosed space is 50 acres. During the year ended March 31, 1904, the value of goods imported here was £194,656 and of produce exported £967,716. The town is situated on rolling hills overlooking the sea. The streets are irregular, but the public and commercial buildings, churches, and private houses are generally well and handsomely built of stone. The chief industries are meat-freezing, sawmilling, flour-milling, &c. The town has a good high-pressure water-supply, and is connected by well-made roads with the surrounding districts, and by rail with Fairlie, the route to the Mackenzie Country and Mount Cook. The population is about 7,000 persons.

Of other towns in Canterbury the following deserve mention: Rangiora, population, 1,768 persons, twenty miles from Christchurch by northern line of railway, is situated in the centre of a fine farming country, and possesses manufactories, including flax-mills, flour-mill, and brewery. The town and neighbourhood are much benefited by plantations.

Kaiapoi, on the Waimakariri, population 1,795, about fourteen miles from Christchurch by the northern railway-line, lies in a rich farming country, rendered pleasing and attractive by the extent and variety of plantations and gardens. There are factories and various industries, including ham and bacon curing, saw-mills, brewery, and agricultural-implement works. Here also is the famed Kaiapoi Woollen-mill, which employs 600 hands when trade is brisk. The Waimakariri is navigable for small vessels to the centre of the town.

Ashburton, the newest of the towns, has a population of 2,322, and is fifty-three miles from Christchurch on the southern trunk line. It is a well-built town, with extensive and beautiful recreation-grounds and gardens. It owes its existence to the settlement of the plains, the surrounding country being well adapted for farming. There are meat-freezing works, a cordial-factory, flour-mills, gasworks, ironworks, woollen-mill, brickworks, &c.

Geraldine, population 868, is situated on the Waihi River, four miles from Orari Railway-station, about eighty-six miles south-west from Christchurch. It is a neat and pretty town, in a first-class farming district, and has a beautiful park of native forest-trees.

Temuka, eighty-nine miles from Christchurch, on the southern railway-line, is a well-built town, with good agricultural land all round. It possesses flour-mills, a butter and cheese factory, brewery, foundry, fellmongery and paper-mill. There is a beautiful park and domain. The population of the borough is 1,550 persons.

Waimate, population 1,500, is situated on the Waihao Forks Railway, about four miles from Studholme Junction, over a hundred miles from both Christchurch and Dunedin. This town is the centre for an extensive back-country, and a splendid agricultural area. It owes its origin to the sawmill industry of the Waimate bush. Industries: sawmilling, flour-milling, &c.

Akaroa, population 600, situated on the noble harbour of that name, was founded in 1840, in the first instance by the French. It is a quiet, picturesque little place, much patronised by Christchurch residents and others as a summer resort and watering-place. It was here that Captain Stanley hoisted the British flag on 11th August, 1840, when he took possession of the Middle Island on behalf of the Crown, forestalling the French by a few hours only. A suitable obelisk commemorating this event has been erected on the spot.

THE OTAGO LAND DISTRICT.

DAVID BARRON, Commissioner of Crown Lands and Chief Surveyor.

Boundaries and Area.

The Otago Land District lies between the 44th and 47th parallels of south latitude, and extends from 167° 20′ to 171° 10′ of east longitude. It is bounded on the north by the Canterbury Land District; on the south-east and south by the ocean; on the west and south by the Waikawa, Mokoreta, Slopedown, Waikaka, Chatton, Wendon, Waikaia, Gap, Rockyside, and Kingston Survey Districts, the western and southern shores of Lake Wakatipu, the Mid-Wakatipu, Mavora, Swinton, Eglinton, Arran, and Doon Survey Districts, and a straight line from the north-east corner of the last-mentioned district to the nearest arm of George Sound, and by George Sound to the ocean; and on the north-west by the ocean to Big Bay.

The district measures about 160 miles from Milford Sound on the west coast to Waikouaiti Bay on the east coast, and the same distance from north to south. Its area is 9,482,800 acres.

Physical Description.

The country generally is mountainous, the highest land being to the north-west, and culminating in Mount Aspiring, 9,960 ft. above the level of the sea.

The west coast mountains are remarkably rugged and grand; and of the thirteen sounds that pierce this coast, three are within the limits of the Otago Land District, the remaining ten being on the west coast of the Southland District.

These three are Milford Sound, Bligh Sound, and George Sound. Milford Sound, though only eight miles in length, contains some of the grandest scenery in the world; and fourteen miles inland from its head is the great Sutherland Waterfall, 1,904 ft. high, possibly the highest waterfall known. Bligh Sound is smaller than Milford, and not nearly so interesting; but George Sound is larger, and very picturesque.

A tourist track has been opened from the head of Te Anau Lake to Milford Sound. The Government Tourist Department has now assumed complete control of this track, and has established a comfortable accommodation-house at the head of Te Anau, where guides are in readiness from the 1st October to the 30th April. There are six huts on the track, supplied with blankets, provisions, &c., and a man in charge of each hut. During the season there is a weekly mail between Te Anau and Milford. The track runs through the Clinton Valley, passes the Sutherland Falls and Lake Ada, and opens out some of the finest scenery in the colony. A practicable route has also been discovered, and a track formed, from the north-west arm of the middle fiord of Te Anau Lake to the head of George Sound.

For nearly one hundred miles inland from the west coast the country is very mountainous, but at a distance of sixty or seventy miles from the south-east coast-line it begins to get gradually lower, taking the form of rolling hills and downs along the sea-shore.

Rivers and Lakes.

The largest rivers are the Clutha, Taieri, and Waitaki: the first-named drains Lakes Wakatipu, Wanaka, and Hawea; the last, Lakes Ohau, Pukaki, and Tekapo, in the Canterbury District. Te Anau, the largest lake in the Middle Island, lies partly in the Otago and partly in the Southland District. The dimensions of these lakes are as follows:—

Lakes.	Length in Miles.	General Breadth in Miles.	Area in Square Miles.	Height above Sea-level in Feet.
Te Anau ..	38	1 to 6	132	694
Wakatipu ...	50	1 to 3½	114	1,069
Wanaka ...	29	1 to 3	75	928
Hawea ...	19	3	48	1,062
Ohau ...	11	1 to 3	23	1,720
Pukaki ...	11	2½ to 5	31	1,588
Tekapo ...	15	1 to 3½	32½	2,325

These lakes are situated in mountainous country; they are of glacial origin, and all very deep.

The steamer service on Lake Wakatipu is now owned by the Government, and is under the control of the Railway Department. During the summer months the steamers run between Kingston and Queenstown daily, and to the head of the lake from Queenstown three times a week. During the winter months the daily service to Kingston is maintained, but the communication with the head of the lake is only bi-weekly.

On Lakes Wanaka and Te Anau smaller steamers are in use.

The Clutha River is the largest in New Zealand, and is estimated to discharge over 1,000,000 cubic feet per minute. It has a rapid current, but is navigable for small steamers for a distance of forty miles from its mouth. The Waitaki is not a navigable river. For some seventeen miles from its mouth the Taieri River is affected by tides, which run up one branch into Waihola Lake, and up the other branch as far as Allanton (Greytown).

A small privately-owned steamer runs from Henley to the mouth of the Taieri River on holidays and during the summer months. The

scenery down the Taieri River is exceptionally fine, and the numerous excursions are well patronised by those in search of a day's outing. The distance from Henley to Taieri Mouth is about eight miles.

Plains.

There are some considerable areas of tolerably level land in the interior, the largest being the Maniototo Plains, the Idaburn, Manuherikia, and Upper Clutha Valleys. Their dimensions are approximately as follows: Maniototo Plains, length, twenty-four miles; average breadth, ten miles; Idaburn Valley, twenty-five miles by four miles; Manuherikia Valley, thirty-five miles by four miles; Upper Clutha Valley, thirty-three miles by five miles.

The Taieri Plain, nearer the coast, is about the same size as the Idaburn Valley, and is very fertile. Other plains are the Waitaki in the north, the Tokomairiro, the Strath-Taieri, the Tapanui, and the fertile Inch-Clutha, lying between the two branches of the Clutha River, and consisting entirely of alluvial deposit. There is also a good deal of low country, chiefly rolling downs, on the south-west side of the Clutha near the sea.

Forests.

The forest land lies mostly along the sea-coast, the largest area of bush being Tautuku Forest, about forty miles in length and fifteen miles in breadth. The western part of this forest is in the Southland District. The other principal forest areas are in the following localities, viz.: north of Dunedin, east of the Tapanui mountains, in the upper valley of the Waikaia River, and towards the north-west coast.

The forests of Otago contain a large variety of useful timber, both hard and soft wood; some being suitable for building purposes, while other varieties are highly ornamental, and much prized for cabinet-work.

Building Stones.

Building-stones of good quality are found in various places throughout Otago. The Port Chalmers quarries afford an inexhaustible supply of bluestone, a basaltic stone of great hardness and durability; and the neighbourhood of Hindon furnishes a bluestone of superior quality. In Otago central a hard, close sandstone is obtained near Kokonga. A hard freestone of excellent quality is found at Waikawa, where there is a large hill of it close to the water's edge. Blocks of very great size can be obtained. There is also a freestone of superior quality on the property lately owned by the late Hon. W. J. M. Larnach at the Peninsula. A dense dark granite is obtainable on Ruapuke Island; specimens, both tooled and polished, may be seen in the base and pilasters of the new Government Life Insurance Buildings at Dunedin. A soft white building-stone—the well-known Oamaru limestone—is found in large quantities along the railway-line near Oamaru, from whence a good deal is exported to other parts of New Zealand and to the Australian States. A similar kind of stone is found at Otekaike, about two miles from the railway-station, and it may be interesting to note that during the years 1891–93 about 3,000 tons of stone were sent from the Otekaike quarries to form the facings of the Melbourne Fish-market.

Limestone for Burning.

Limestone is found in the following places: Oamaru, Otekaike, Otepopo, Waihemo Waikouaiti, Lower Harbour, Peninsula, Waihola, Millburn, and Wakatipu.

The Millburn Lime and Cement Company burn large quantities of lime at their Millburn works, whence it is sent to all parts of Otago, for building purposes, gasworks, &c. It is also largely used in farming, and the productiveness of the Tokomairiro Plain has been greatly increased of late years by its application to the soil. Large cement-works belonging to the same company have been open for some years on the reclaimed land in Otago Harbour, near Dunedin. The cement manufactured at these works is considered fully equal, if not superior, to the best imported, and is largely used in building and other constructive works.

The Government lime-kilns at Makareao, near Dunback, have been leased for five years. The lime produced is of good quality, and there is a branch railway to the kilns.

Coal and Lignite.

In the southern portion of Otago and in part of Southland thin seams of coal of a bituminous character exist. Probably the coal produced from the pits at Kaitangata and Nightcaps is the best in quality. First-class brown coals are worked in several parts of Otago and Southland, the principal seats of the industry being Shag Point, Gore, Mataura, Coal Creek Flat, and Green Island.

Beds of lignite are also found in numerous localities, chiefly around the margins of the old lake-basins and along the courses of the older river-valleys, and are worked on a sufficient scale to supply local requirements.

The output of coal and lignite in Otago and Southland for 1903 was 405,839 tons, an increase of 8,443 tons on the previous year.

Climate.

The climate of Otago is on the whole fairly equable. Central Otago suffers a little from the intensity of the cold in the winter and the excess of heat in summer; but places on the sea-coast have a fairly even temperature all the year round. There is a somewhat large area of practically rainless territory, which includes the Maniototo Plains, the Idaburn and Manuherikia Valleys, and extends to Lakes Wakatipu, Wanaka, Hawea, and Ohau on the west and north, and to the northern portion of Waitaki County on the north-east. From Oamaru the direction would be across country to Mount Benger and to the southern end of Lake Wakatipu. This part of the country is well adapted for sheep of all kinds, especially merinos, some of the runs being capable of carrying 80,000 sheep. Wonderful results have been worked with irrigation on parts of the hitherto dry and barren portions of Central Otago.

West Coast.

In marked contrast to Central Otago is the West Coast District, which may be described as having a wet climate. Not that the number of wet days in the year is very great, but it is subject to very heavy rains from the north-west, the fall generally exceeding 100 in. per annum. But, although wet, the climate is mild, and the vegetation is consequently luxuriant. Mr. and Mrs. Sutherland keep a house of accommodation for tourists at the head of Milford Sound. There are very few visitors to the Sounds during winter, but in summer the tourist traffic is considerable. Towards the south-east and south coasts of the district the climate is moist, being somewhat similar to that of Dunedin, where the average rainfall is 35 in., distributed over 163 days in the year.

At Martin's Bay three families have settled, consisting of ten persons. Their sheep and cattle are increasing, and the land is gradually being cleared.

There are thousands of acres of first-class bush land in and around Martin's Bay well adapted for dairy-farming and stock-raising only awaiting selectors to occupy them. The land belongs to the Crown, and is at the present moment open for application at the Land Office, Dunedin. Good milling timber, consisting of red, white, and black pine, beech, and totara is obtainable on this part of the west coast.

Fruit.

There are some fine fruit-growing districts in the valley of the Clutha, from below Roxburgh right up to Lake Wanaka. The summers are dry and warm, and the soil suitable. Apricots, peaches, &c., come to maturity fully a month before they do at Dunedin, and grapes ripen in the open air. There is a great future for this neighbourhood in the growing of those varieties of fruit which agree with and

thrive in a dry climate. The grape might be cultivated either for wine-making or for the table, and some varieties could be made into good raisins. The dryness of the atmosphere is favourable for preserving all kinds of fruit, while the Otago Central Railway will bring portion of the valley into direct communication with a market.

Crops.

Cereals of all kinds do very well over nearly the whole of the provincial district, including Southland. The following are the agricultural statistics for the year ending the 31st March, 1904:—

Total area under cultivation in the provincial district, including sown grasses and fallow land, 2,397,864 acres. Corn-crops sown for threshing, chaffing, and feeding-off, comprising wheat, oats, barley, rye, peas, beans, linseed, 329,064 acres; land broken up and grassed, 1,462,971 acres; in clover, 3,332 acres; surface-sown with grass without the land being first broken up, 353,544 acres; plantations, &c., including private gardens, market gardens, orchards and vineyards of a quarter of an acre and upwards, 12,047 acres; land ploughed but not planted, 33,863 acres; area in tussock or native grass, 8,129,610 acres.

	Acres.	Estimated Yield per Acre.	Total.
Wheat for threshing ...	52,302	36 bushels	1,891,711 bushels
Oats ,, ...	197,807	40 ,,	7,811,075 ,,
Barley ,, ...	4,969	32 ,,	161,921 ,,

Stock.

Total number of sheep on 30th April, 1903 (including 752,957 merinos)	3,632,765
Horses	59,082
Cattle	212,932
Swine	24,618

The dairy industry continues to flourish and expand in Otago, and new lands are continually being brought under cultivation.

The export of rabbit-skins from Dunedin during the financial year ended 31st March, 1904, amounted to 5,007,381 skins, valued at £31,837.

Freezing Establishments.

There are nine meat freezing and preserving works in Otago. The principal freezing establishments are at Oamaru, at Burnside, and at Port Chalmers. At Oamaru there is a 60-ton Hercules refrigerator, capable of freezing 1,200 sheep a day, and there is storage-room for 25,000 carcases. At Burnside there is a 70-ton Hercules machine, capable of freezing 2,000 carcases per day, and storage-room for 50,000 carcases. The Port Chalmers freezing-works, erected in 1896 by the Otago Dock Trust, cost £4,500. They are used principally for the storage of butter prior to shipment, but the freezing-chambers have also been used for sheep, rabbits, and fish. The refrigerating machinery includes a 12-ton Hercules refrigerator. The capacity of the building is 30,000 cubic feet, and 50 tons of butter can be handled per week. The capacity has lately been nearly trebled, at an additional cost of £8,500. These additions include a 35-ton Hercules refrigerator.

Gold Production.

Otago produces about one-third of the gold-output for New Zealand.

Gold is found very generally distributed throughout Otago, except in the southern portion of the district. The principal localities are: Clutha Valley, Tuapeka, Shotover, Cardrona, Tinker's, St. Bathan's, Mount Ida, Nevis, Bannockburn, and Maerewhenua.

Last financial year 162,582 oz. of gold were exported from Dunedin, having value of £654,609.

Woollen-mills.

There are four woollen-mills at work in the Provincial District of Otago, employing about 1,000 hands. The woollen industry in Otago is of greater magnitude than in any other district of New Zealand.

Besides supplying local needs Otago Provincial District exported during the year ended 30th June, 1904, 20,769,697 lb. of wool, having a value of £675,001.

Other Manufactories and Works.

Under this head the census returns of 31st March, 1901, gave within the Otago Provincial District—13 meat-preserving works; 12 bacon-curing establishments; 13 fish-curing establishments; 42 butter and cheese factories; 27 grain-mills; 7 biscuit-factories; 2 jam-factories; 4 confectionery-works; 15 breweries; 8 malthouses; 17 aerated-water and cordial factories; 2 sauce and pickle factories; 4 soap and candle works; 4 cooperages; 70 sawmills and sash-and-door factories; 5 gasworks; 5 lime and cement works; 25 brick, tile, and pottery works; 11 tinware-factories; 14 iron and brass foundries; 8 engineering-works; 12 agricultural implement factories; 49 printing establishments; 20 coach building and painting establishments; 21 cycle-works; 20 saddlery and harness factories; 33 fellmongeries, tanning, currying, and wool-scouring establishments: 9 ship and boat building yards; 7 sail, tent, and oilskin factories; 32 furniture-factories; 8 clothing factories; 2 waterproof-factories; 7 hosiery-factories; 35 boot-and-shoe factories; 4 rope and twine works; and 16 flax-mills.

The total number of works of the above description in the Otago Provincial District was 809. The motive power employed comprised 295 steam-engines, 43 water-engines, 98 gas-engines, 4 oil-engines, 21 worked by horse and 3 by electricity, making a total of 464, with horse-power amounting to 8,390. The number of hands employed was 8,745 males and 3,057 females, who received in wages £733,671 and £96,069 respectively. The value of materials used or operated upon in 1900 was £1,741,981, while the approximate value of the manufactures, &c. (including repairs), was £3,749,497. The approximate value of the land, buildings, machinery, and plant totalled £1,862,858. The above amounts are exclusive of Government railway workshops.

Under the head of mining there were 26 gold-quartz mines, 68 hydraulic gold-mines, 121 gold-dredges, and 105 coal-mines in operation.

Chief Towns.

The following are the chief towns of Otago, with their population at last census, including all having 1,000 inhabitants and upwards: Dunedin, and suburbs, 52,390; Oamaru, 4,836; Port Chalmers, 2,056; Mosgiel, 1,463; Milton, 1,241; Kaitangata, 1,463; Lawrence, 1,159; Balclutha, 1,017.

City of Dunedin.

Dunedin, the capital city and commercial centre of Otago, is situated at the head of Otago Harbour, and is distant nine miles—about half an hour's journey by rail—from its seaport, Port Chalmers. Otago Harbour has been greatly deepened by dredging during the past decade, and ocean liners are now berthed alongside the Dunedin wharves.

The city proper is about two miles and a half long by a mile broad, and is dotted here and there with handsome public buildings and large warehouses which compare favourably both in size and architecture with those in other centres of New Zealand. Among buildings of note may be mentioned the new Supreme Court, Knox Church, St. Joseph's Cathedral, Boys' High School, First Church, Town Hall, and Otago University. The city has been much beautified of late years with numerous parks and reserves artistically laid out by the Dunedin and Suburban Reserves Conservation Society, who have taken in hand with praiseworthy energy the task of planting with trees and flowers hitherto neglected areas of waste land. The Octagon, Jubilee Park, and

Victoria Gardens (formerly known as the Triangle) are standing monuments to the society's work.

The private residences of Dunedin are largely situated on the hills sloping upwards from the harbour, and cable tramways connect the city proper with the hill suburbs. A reserve of native bush fringes the hills round about, and is traversed by a fine carriage road, named "The Queen's Drive," from which views of the harbour and city can be obtained. This reserve—known as the Town Belt—was set apart in the early days of Otago settlement.

The city has now an electric tram service, which is being rapidly extended to the favourite seaside resorts of Ocean Beach and St. Clair, each within three miles of the Chief Post Office. At the northern end of the city—about two miles from the Chief Post Office—the electric cars run down to the Botanical Gardens, which are tastefully and artistically laid out with many beautiful flowers and shrubs. A band rotunda has been erected here, and on Sunday afternoons sacred concerts are given throughout the summer months.

The Woodhaugh Valley, the reservoir, and the Leith Valley with its waterfalls, are also within easy distance of the town, and from a scenic point of view possess many features of interest.

Dunedin is well supplied with elementary schools, there being six large schools in the city proper, with an attendance of 3,470 pupils, and twelve more in the suburbs, with 4,065 pupils.

There is also in Dunedin a training-college for teachers. The students in training number forty-four. They devote every fifth week during the session to practice in teaching and management of classes in the ten associated schools of the city and suburbs.

The School of Art and Design is in the same building as the Normal School, and has a staff of six teachers and a pupil-teacher. In 1903 there were 392 students in attendance.

The Otago Boys' High School stands on a commanding plateau 300 ft. above the business part of the city and the harbour. The school was opened on the 3rd August, 1863, in the building in Dowling Street now occupied as the Girls' High School. The new buildings in Arthur Street were opened by the late Sir William Jervois, Governor, in February, 1885. The teaching staff, including the Rector, numbers twelve; the attendance is about 311.

The Otago Girls' High School was opened on the 6th February, 1871, with a roll of 78 pupils. The present attendance is 221, with a teaching staff of 10, exclusive of visiting teachers. Otago holds the proud distinction of having established the first Girls' High School in Australasia. Among the earnest band of workers who laboured to establish this first High School for girls the name of Miss Dalrymple stands pre-eminent, and will ever be held in grateful remembrance by the people of Otago.

At the commencement of the year 1903 the Board of Governors accepted the Government's offer in connection with providing free secondary education by admitting sixty-three boys and fifty-one girls who passed the sixth standard in the primary schools and were under fourteen years of age on 31st December, 1902, on payment by the Government at the rate of £6 per annum per head.

There are now 171 boys and 140 girls in attendance at the schools under the new Government regulations.

The Otago University was founded in 1869, and opened in 1871. It is well housed in a handsome pile of buildings in the domestic Gothic style. There are three separate faculties in the University—viz., Arts and Science, Medicine, and Mining. The School of Medicine provides the full course for a Medical degree of the University of New Zealand. There is a Medical Museum in the University buildings containing anatomical, pathological, and other preparations and models. The teaching staff numbers at present twenty-two professors and lecturers. The School of Mines occupies a separate (temporary) building. There are at present about forty students going through the prescribed courses for the diplomas and cer-

tificates in the Mining, Metallurgical, Geological, Mine and Land Surveying, and the Assaying Divisions. Of undergraduates keeping terms there are 287—viz., 200 men and 87 women. The University Library contains over 5,000 specially selected volumes, and is open to the public under certain conditions for purposes of reference. The Chemical and Physical Laboratories are well fitted up, and furnished with all necessary instruments and appliances. There are six scholarships tenable at the University, ranging in value from £15 to £30 per annum.

The public Museum, of which the Professor of Biology is Curator, is under the control of the University Council. It is situated in Great King Street, about five minutes' walk from the University. There is a public Art gallery attached, which contains some good works of art. Up to the present time only the central portion of the original design for the Museum building has been erected.

The Dunedin Athenæum and Mechanics' Institute is centrally situated in the Octagon, and possesses a well-maintained library of over 20,000 volumes, and a membership of about 1,400 subscribers. The building has lately been enlarged, and in addition to the circulating library contains a reference library, a large reading-room with an excellent supply of magazines and newspapers from all parts of the world, a chess-players' room, and a smoking-room.

The Cargill Monument, which was erected to the memory of the late Captain Cargill, the founder of the Otago settlement, stands in the Triangle, between the Customhouse and the Bank of New Zealand. It is an ornate specimen of early decorated Gothic.

Towns and Surrounding Country.

Port Chalmers (eight miles from Dunedin) situate on Otago Harbour, midway between the Heads and Dunedin, has a population of over 2,000. It is the chief port of Otago, and possesses every accommodation for Home vessels, including dry dock, 80-ton sheer-legs, steam-hammer, and other appliances, besides several private foundries, cool-storage chamber, &c. The Port Chalmers graving dock is described in the article on page 66.

Leaving Dunedin by the northern railway, winding in and out through the hills which surround the town, and skirting the precipitous cliffs of the coast-line, the first station of importance reached is Waitati, a favourite seaside resort in Blueskin Bay ; distance, seventeen miles. Fifteen miles beyond is Waikouaiti—population, 690—pleasantly situated on the Hawksbury lagoon, the centre of a flourishing farming country. The next place of note is Palmerston, forty-one miles from Dunedin, with 738 inhabitants. A branch-line leaves Palmerston and runs nine miles up Shag Valley to Dunback. Six miles further on the main line there is a branch to Shag Point, a coalfield, with two pits being actively worked.

Oamaru (seventy-eight miles) is the second town in Otago, having a population of about 5,300. It is the centre of a large farming district, and has a good harbour, formed by a concrete breakwater, for the reception of ocean-going ships. The chief exports are wool and grain. A branch-line runs from the junction near Oamaru up the Waiareka Valley to Ngapara, seventeen miles, and Tokarahi, twenty-five miles from Oamaru, and another seven miles by road leads to Livingstone.

Starting from Oamaru, and proceeding to Central Otago, *viâ* the valley of the Waitaki River, the first part of the journey is accomplished by rail across the fertile Papakaio Plains to Awamoko (ninety-six miles), and thence following up the Waitaki River past Duntroon to Kurow (120 miles from Dunedin). At Kurow the traveller leaves the railway and follows the course of the Waitaki through pastoral country to Rugged Ridges Station (133 miles); a little beyond Rugged Ridges the road leaves the Waitaki River, and crossing the Ahuriri Pass (141 miles), strikes the Ahuriri River, which it follows up past Omarama Station (158 miles) to the junction of Longslip Creek ; it then ascends this creek until Lindis Pass saddle is reached (172 miles), at a height of 3,185 feet. Here begins the descent to the Clutha Valley *viâ* Morven Hills Station (181 miles) and Tarras Station (200 miles). From Tarras Station the road runs through settled farming country up the Clutha River, which is crossed by means of a punt at Newcastle (219 miles), and four miles more brings the traveller to Pembroke, on the southern shore of Lake Wanaka.

From Dunedin the main trunk railway runs southward to Invercargill, a distance of 139 miles. Passing through the Caversham Borough and tunnel the traveller reaches Burnside (four miles) and Abbotsford (five miles), industrial centres, with coal-mining, tanning, iron-smelting, and other works. Four miles farther on is Wingatui, the junction of the Otago Central Railway; and ten miles from Dunedin is Mosgiel, a rising township with 1,500 inhabitants, noted for its woollen-mills. The railway-line now skirts the Taieri Plain, an alluvial flat eighteen miles long by five miles broad; the most fertile portion of Otago. A branch-line nine miles long from Mosgiel junction runs to Outram, on the farther side of the Taieri Plain. Passing the smaller Townships of Allanton (Greytown) and Henley, and Lakes Waihola and Waipori, the main line strikes Milton (thirty-six miles). Milton, in the middle of the Tokomairiro Plain, is a town of 1,400 inhabitants, with flour-mill, dairy factories, flax-mill, pottery-works, and tannery. The next place of importance is Balclutha (fifty-three miles), on the banks of the Clutha River, with flax-mills, dairy factories, and chicory works; population 1,100. Kaitangata, situated lower down the Clutha River, and connected by a branch-line four miles long, has extensive coalfields, and a population of about 1,500. Leaving Balclutha, the main line runs through the Clutha downs, passing the small centres of Waitepeka, Warepa, Kaihiku, and Waiwera, and reaches Clinton (seventy-four miles), on the Waiwera stream, a favourite resort of anglers. The next station of note beyond Clinton is Waipahi Junction (eighty-four miles), on the Waipahi River, likewise a favourite fishing-ground. Further on is Gore (100 miles), on the Mataura River, in the Southland District. Gore is a fast-rising township of 3,500 inhabitants, with paper-mill, flour-mill, freezing-works, dairy factory, coal-mines, &c.

A branch-line from Waipahi follows up and crosses the Pomahaka River and connects Tapanui (107 miles), Kelso (110 miles), and Heriot (114 miles). An extension of this line for a distance of over six miles to Edie's is nearly completed.

The Otago Central Railway starts from Wingatui, crosses the Taieri Plain, and then winds round to the Taieri River, which it follows up to Waipiata, 81 miles from Dunedin, thence proceeds across the Maniototo Plain to the watersheds of the Taieri and Manuherikia Rivers and through the Ida Valley to Blacks (Ophir), the present terminus.

In its course along the river it runs for some distance through a rocky gorge, but after crossing the Sutton Stream enters Strath-Taieri—a comparatively flat, open country. Near Hindon Station (twenty-five miles from Dunedin), in the Taieri Gorge, and Barewood (thirty-seven miles), there are quartz-reefs being worked. In traversing the Strath-Taieri the line passes the Blair-Taieri Village Settlement (forty-four miles), Middlemarch, a rising township (forty-eight miles), and reaches Hyde (sixty-four miles). The line passes through the Poolburn Gorge across the Manuherikia River to a point immediately opposite the Township of Ophir. The townships of Alexandra and Clyde are thus brought within seventeen and eighteen miles respectively of the railway.

The extension of the line to Clyde presents no engineering difficulties. Central Otago has a great future before it, as in the opinion of experts it is naturally adapted for producing fruit of different kinds in perfection.

Another means of access to Central Otago is by the Clutha Valley.

Two miles beyond Milton the Lawrence branch leaves Clarkesville Junction, runs up the Tokomairiro River and the gorge of Manuka Creek, and down to Waitahuna (fifty-three miles from Dunedin), and Lawrence (sixty miles), gold-mining centres, with an aggregate population of about 1,500. Gold was first discovered here in 1861, and the mines are still yielding freely. From Lawrence a coach runs to Beaumont (seventy-two miles), on the Clutha River, and thence up the Clutha Valley. Crossing the Beaumont Bridge the road follows the west bank of the Clutha, passing numerous dredging-claims. At eighty-nine miles is Ettrick, and seven miles further on is Roxburgh—the Teviot—(ninety-six miles), a town of 500 inhabitants.

Following the main road along the west bank of the Clutha River, the traveller reaches Alexandra South (122 miles), at the junction of the Manuherikia River with the Clutha, and Clyde—the Dunstan—(130 miles), the county town of Vincent County. The next place of

importance is Cromwell (143 miles), at the junction of the Kawarau River with the Clutha. Cromwell is a small town of 700 inhabitants.

If the traveller wishes to pursue his journey farther he can either follow the road up the Clutha to Newcastle and Pembroke, on Lake Wanaka, or take the Kawarau Gorge road by way of the Crown Terrace to Queenstown, on Lake Wakatipu.

Queenstown, a township situated on the shores of Lake Wakatipu, has a population of 700, and is the centre of a large gold-mining district. The chief feature of Queenstown is the grand mountain and lake scenery in the neighbourhood, which attracts large numbers of tourists every year. There are two ways of reaching Queenstown—the one by the Clutha Valley and Kawarau Gorge, as above described, and the other by rail to Kingston, at the foot of Lake Wakatipu, and thence by steamer, which runs to suit the trains.

The Tautuku bush, in the south of Otago, has only lately been opened up, but already a large number of settlers are making their homes there. Starting from Balclutha the Catlin's River branch-line runs southwards to Romahapa (sixty-one miles from Dunedin) on the crossing of the main road to Port Molyneux, thence to Glenomaru (sixty-five miles), Owaka (seventy-two miles from Dunedin), and the present termination at Catlin's, four miles further on. The Catlin's-Waikawa main road is formed the whole way through, as are also numerous district roads.

Railways.

The principal lines are as follows: (1.) The main trunk line from Dunedin to Christchurch, with branches from Oamaru to Hakataramea, forty-three miles; and Oamaru to Ngapara and Tokarahi, twenty-five miles; also, Palmerston to Dunback, nine miles. (2.) The main trunk line, Dunedin to Invercargill, with branches—Mosgiel to Outram, nine miles; Milton to Lawrence, twenty-four miles; Stirling to Kaitangata, five miles; Balclutha to Catlin's, twenty-three miles; and Waipahi to Heriot, twenty miles. (3.) The Otago Central, from Wingatui to Blacks, 119 miles.

Statistical.

The total population of the Otago Provincial District on the 31st March, 1901, was 173,145.

Area of Otago Land District: Open land below 2,000 ft., 5,300 square miles; forest land below 2,000 ft., 1,960 square miles; open land above 2,000 ft., 6,777 square miles; forest land above 2,000 ft., 500 square miles; area of lakes, &c., 280 square miles: total, 14,817 square miles, or 9,482,800 acres.

The following table shows the disposition of the land in the Otago District on 31st March, 1904:—

	Holdings.	Acres.
1. Lands finally alienated, comprising freehold land and vested reserves		2,821,648
2. Lands held on deferred payment, rural	39	12,403
3. Lands held on perpetual lease, rural	232	44,395
4. Lands held under occupation-with-right-of-purchase clause	223	38,619
5. Lands held on lease in perpetuity, ordinary Crown lands, rural	681	172,182
6. Lands held under agricultural lease on goldfields ...	17	542
7. Lands held under Mining Districts Land Occupation Act	205	7,874
8. Lands held under village settlement, deferred payment ...	2	100
9. Lands held under village settlement, perpetual lease ...	16	357
10. Lands held under village settlement, lease in perpetuity ...	114	1,669
11. Lands held under village-homestead special settlement, perpetual lease	76	1,174
12. Lands held by special-settlement associations, lease in perpetuity	14	2,765
13. Lands held as small grazing-runs	272	557,071
14. Lands held under pastoral license, not including bush ...	226	4,385,344

	Holdings.	Acres.
15. Lands held under lease and license for miscellaneous purposes, exclusive of gold-mining	621	104,715
16. Lands acquired and disposed of as lease in perpetuity under Land for Settlements Act, rural	415	57,138
17. Lands acquired and disposed of as small grazing-runs under Land for Settlements Act	3	3,667
18. Lands acquired and disposed of as pastoral homestead sites under Land for Settlements Act	2	954
19. Lands acquired and disposed of as miscellaneous licenses under Land for Settlements Act	50	803
20. Crown lands open for selection (including Land for Settlements Act), exclusive of pastoral lands	...	54,110
21. Crown lands being prepared for selection	...	19,740
22. Land open for application under pastoral licenses ...	...	45,249
23. Lands held by aboriginal natives	...	16,500
24. Lakes, and Clutha and Taieri Rivers	...	179,200
25. Balance of Crown lands, including mining reserves, public reserves not vested, bush-lands, roads, barren country, &c.	...	1,022,175

Total area of district (14,817 square miles), 9,482,800

Tenants of lands included in 2, 3, and 4 have the right of acquiring the freehold. There is no right of acquiring the freehold for tenants of lands included in 5, 6, 11, 12, 13, 14, 15, 16, 17, 18, and 19. From item No. 1 should be deducted 67,594 acres, having been acquired under Land for Settlements Act, and absorbed in items Nos. 16, 17, 18, 19, and part 20. The summation of items exceeds total area of district by this amount.

THE SOUTHLAND LAND DISTRICT.

J. Hay, Chief Surveyor.

Physical Features.

The Southland District may be stated to comprise the Counties of Fiord, Stewart Island, Southland, Wallace, and part of Lake, and is bounded on the north and east by the Otago District, and on the south and west by the Tasman Sea, and may be said to lie between south latitudes 45° and 47° and east longitudes 166° 15′ and 169° 15′. For administrative purposes, however, the Snares, Auckland, Enderby, Campbell, Antipodes, Bounty, and all other islands within the limits of the colony south of the 47° parallel of south latitude are included in it.

Area and Nature of Lands.

The total area of the district, including Stewart Island, but exclusive of Solander, Ruapuke, and the other small islands enumerated above, is 6,966,592 acres, of which 500,000 are covered with bush. A considerable area in the Fiord County consists of immense alpine country with scrubby bush reaching to the snow-line. This little-known country extends to the western sea, and there presents the remarkable indentations of the coast-line known as the West Coast Sounds. The whole region is a paradise for the artist, and, indeed, for all enthusiastic lovers of nature, but has little attraction for the agriculturist or pastoralist. The bush land suitable for timber lies in the neighbourhood of Forest Hill, Hokonui, Waikawa, and on Stewart Island. The timbers of commercial value are totara, rimu, miro, matai, kahikatea, rata, and kamahi, in mixed bushes; but *Fagus fusca* and other beeches predominate on the high lands.

The open land in Southland and Wallace Counties, in its natural state, carries tussock and snow-grass, fern, flax, manuka, &c., and there is a considerable area of marshy land, interspersed here and there with peat bogs.

Perhaps the most striking feature, if we exclude the Fiord country, is the number of well-defined rivers and valleys of the district, the latter often widening out to such an extent as to form very extensive plains. Commencing with the eastern side, the Mataura, Oreti (or New River), Aparima (or Jacob's River), and Waiau are the most prominent illustrations of this; but these rivers by no means exhaust the list, as they all have numerous tributaries, which exhibit the same features on a smaller scale.

Speaking generally, the watersheds of these rivers do not attain any great height until followed far inland, and near the great lakes to be presently noticed. From what has been said above it follows that the extensive plains and valleys referred to are of alluvial formation, in many places of very rich and fertile quality, and capable of raising crops of every known product, subject, of course, to climatic limitations. Generally these plains and valleys rise from the river-levels in a very gradual slope, sometimes into a series of terraces from 10 ft. to 50 ft. in height, and sometimes into undulating hills intersected at frequent intervals by lateral gullies affording natural drainage and an abundant supply of water.

These hills are covered with an indigenous growth, consisting of tussock and other grasses, fern, flax, &c., and even in their native state afford excellent grazing for sheep.

Near the large lakes, such as Wakatipu, Te Anau, Manapouri, Hauroko, and others, and between these and the West Coast, the country becomes very high, often reaching 5,000 ft. and 6,000 ft. above sea-level, with very steep and rugged spurs—this is the Fiord country before referred to. The open country occasionally presents a number of ridges and lesser mountain-tops covered with tussock and other herbage, affording admirable pasture for sheep in summer; but stock have to be removed from April to October, during which period this country is generally covered with snow.

Southland does not contain so much forest as most of the North Island districts, and this will account for its early and extensive settlement; nevertheless there are considerable areas of forest in the eastern, southern, and western parts, and on Stewart Island, and a large export trade is done in the different kinds of pine and other timbers used for building, engineering, furniture-making, &c.

From what has been said of the river systems it will be evident that the country is well supplied with water, although none of the rivers can be used for purposes of internal communication; but the plains are traversed by railways for considerable distances from the principal towns, and where the railways end communication is continued by good roads, so that there is probably no part of the colony better off for means of transit; and with the Bluff Harbour the Southland District would seem to possess every facility.

Agriculture.

Having already touched on the character of the soil, it only remains to say that the plains, terraces, and lower hills are well adapted for raising wheat, oats, and other cereals, turnips, mangolds, beets, and the various other crops common to temperate climates. Wheat is not so widely grown as it might be, for the reason, probably, that the pastoral branches of farming receive more attention than the agricultural, and wheat is not required for these, whereas oats are largely grown for export and to feed sheep in the form of chaff; turnips also are much cultivated for winter food. Where wheat is grown the yields are very satisfactory, ranging from 40 to 60 bushels per acre, while oats frequently give 70 to 80 bushels.

Linseed is now receiving some attention from farmers, as they find ready sale for it to the manufacturing chemists at remunerative prices, a fair crop yielding over £5 per acre.

Dairy-farming, &c.

Dairy-farming now forms a very important industry in this district, a number of factories having been established, the total number now in the district being 8 creameries, 6 cheese-factories, and 14 dairy factories, one being a large condensed-milk factory and one making first-class Stilton cheese. In this connection the

Customs Department returns (1903) for this district, under "Exports," give the following interesting figures: Butter, 2,247 cwt., value £9,432; cheese, 20,305 cwt., value £50,882.

Sheep-farming.

By far the most important industries are those connected with the raising and export of mutton and wool. Some years ago sheep-farming was much hindered by the inroads of rabbits; but owing to the repressive measures adopted there has been a marked abatement of the pest. The hill-country, although it does not carry a large proportion of stock to area, is eminently healthy. The average carrying-capacity over the whole district would probably be slightly over one sheep to the acre. Until within the last few years most of the runs were stocked with merinos, but owing to the decline in price of merino wool, and to the carcase being unacceptable to the European market, these sheep have, generally speaking, been replaced by Leicesters, Lincolns, Romney Marsh, Cheviot, and crossbreds of various kinds, better suited to the existing demands. The total number of sheep on the books of the local Stock Department reaches 1,173,770. This number is distributed over Southland District. During the early and later portions of the past year many of these were acquired by settlers from the northern districts of the colony, but the successful lambing season intervening has quite neutralised the depletion. A number of large establishments for slaughtering and freezing sheep and tinning meat are at work. Two large establishments are situated at the Bluff, and another at Mataura (on the Main Trunk Railway-line). Beef, mutton, and rabbit tinning works have been established for some years at the Gap Road, near Winton, while another is in operation at Woodlands. The exports from these factories (frozen meats) as returned for past year is as follow: Frozen mutton—94,944 carcases, value £58,163; lamb — 132,704 carcases, value £62,148; rabbit-skins — 631,139, value £4,599.

Industrial (Coal, Gold, &c.).

Extensive seams of coal and lignite are distributed over the district, and a large deposit of brown coal is being developed by the Nightcaps Coal Company. This coal is used throughout the district, and its utility has been recognised by the Railway Department of the colony, some 16,000 tons having been used on the Southland section of New Zealand railways during the past year. Coal of quality similar to that at the Nightcaps has been opened up at Hokonui, and some 52,000 tons have been taken out therefrom. The comparatively small demands of the district, however, led to the mine being closed down a few years since. A deposit of shale covering a fair area exists at Orepuki. Peat is also found in some up-country neighbourhoods—notably, at Mataura—and is used for fuel where wood and coal are scarce. Gold is found all over the district, and is being obtained either by sluicing or dredging. A considerable amount of capital has been invested in river and beach dredges worked by steam. The dredging operations of the past year have for the most part been confined to the streams lying east of the Mataura River. Twenty-one steam-power dredges are on the Waikaka, twelve at Wakaia, and ten in all on the Waimumu and Charlton Streams. These dredges have been working for some years, and the yields of gold, although of an intermittent character, have on the whole been satisfactory. Payable gold-bearing reefs exist in Preservation Inlet and at Stewart Island. Among the lesser industries the preparation of the fibre of the native flax plant (*Phormium tenax*) is worthy of notice. The plant is found all over this district, and sixty-one mills have been set up. The more remunerative and regular prices obtained during the past year will, if upheld, make this a steady industry throughout the district.

Timber.

Last, but of considerable value in results, the timber industry of the district merits attention. For many years the active efforts of the sawmiller have proved a source of considerable wealth. No less than sixty-six sawmills are now at work off and on within the greatly reduced timber-areas of Southland, and it is feared that this district will be worked out; at any rate, the industry will be very considerably reduced in the near future.

Fish.

Salt-water fish abound in great numbers in the waters surrounding Stewart Island, and oysters are found on banks between that island and the Bluff. Fish are largely exported to Melbourne, as also the oysters during the open season. All the large rivers, and many of the tributaries, are well stocked with trout, while for heavy trout-fishing the Waiau River may be mentioned as one of the finest in New Zealand. One river —the Aparima—had salmon-spawn put into it some years ago, and, it is now believed, with success.

Fruit.

The small English fruits, such as gooseberries, currants, raspberries, strawberries, &c., grow in great profusion, as do also apples. Stone-fruits are not so common, although peaches, nectarines, apricots, &c., do well when trained against nursery-walls in favourable aspects.

Climate.

The climate is bracing in winter, and warm and genial in spring and summer. The old residents state that there has been a marked decrease in the rainfall within the last decade. No regular observations have been recorded for the last few years, but it is believed that the average is about 30 in. a year. It may, however, be observed that more rain falls near the coast than inland, and also that the rainfall is more evenly distributed throughout the year than is the case in the northern part of the colony. The temperature varies from 40° in winter to 70° in summer.

Towns.

Invercargill, the chief town, was from the first well laid out with wide streets and liberal reserves in the town belts for recreation purposes. The town has become conspicuous by the architectural beauty presented to the visitor in the many fine buildings. Among these—all in brick, concrete, or limestone—the branches of the leading banks doing business in this colony are prominent, also hotels and many wholesale and retail mercantile houses. The Government Buildings are on a scale not often seen in a town of the same size, and a clock and chimes of New Zealand make have been placed in the central tower. The Corporation provides water and gas, also disposes of sewage, &c., for the citizens. The streets are well lighted, paved, and maintained. Artesian water is pumped to the top of a handsome brick tower—which, by the way, is a very conspicuous landmark—and stored there in a tank, from which most of the houses within the town boundaries are supplied. The population, including suburbs, is nearly 11,000. Five railways concentrate here, one from the famed Cold Lakes, another from Dunedin and Christchurch, a third line communicates with the agricultural and pastoral country lying east of the Mataura River, known as the Seaward Bush line, a fourth line opens communication with the extended area westward covered by the Wallace County and known as the Western District, while the short line to the Port of Bluff carries a heavy traffic—the main produce of the district—for export. Rope and twine, carriage and implement factories, flour-mills, sawmills, fellmongeries, a boot-factory, three bacon-factories, brick and pottery works, iron-foundries, and various other industries are in active operation. There are three first-class hotels. In the summer season Invercargill, by the arrival of intercolonial steamers and express trains, may be said to be thronged with visitors and tourists desiring to view the beauties of Stewart Island or the more distant high alpine scenery and deep waters of the Cold Lakes District (Te Anau, Wakatipu, Manapouri and the further lakes), for, doubtless, the combinations of scenery there presented in mountain, glacier, and lake are unexcelled in either hemisphere. It should also be mentioned that Stewart Island is now connected by means of a submarine cable used for telephonic communication, which is of the greatest service to business-men and pleasure-seekers. Although the Bluff is the principal port, Invercargill is provided with a lesser harbour in the New River Estuary, forming its western margin, where there is a jetty with appliances for the use of small steamers and craft trading with Stewart Island and along the coast, the goods being handled within the town boundaries.

Campbelltown, situate at the foot of the hill known as the "Bluff," has become a place of some importance in the district, being identified with the Bluff Harbour. The town presents some good buildings —frozen-meat works, hotels, grain-stores, and shipping offices, all in brick. Perhaps the most conspicuous building is seen in the Government, Post, Telegraph, and Customs building, with its clock-tower and chimes; while the railway-offices, with hardly less proportions, and conveniences lately added to facilitate the easy handling of goods, assert the prosperity of the place. Connected by rail with Invercargill (eighteen miles—six trains daily), a very large shipping business is effected here in the imports and exports of the agricultural counties of Southland, Wallace, Lake, and Stewart Island, principally consisting in exports of wool, grain, frozen mutton, rabbits, fish, cheese, butter, timber, flax, and oysters; and in imports of general merchandise, guano, coal, and hardwood timber. In 1901, 75,000 tons of grain, chiefly oats, were exported, being about 4,200,000 bushels. The increasing trade of the port has been steadily met by the harbour authorities in increase of wharfage accommodation in the direction of widening and strengthening, and there is now a fine wharf, 1,760 ft. long, with four lines of rails, having 3,300 ft. of berthage, all well lit, as also the town, with electric light. As a further indication of the importance of the port, it may be stated that steamers having a combined net tonnage of 412,162 tons entered inwards during 1903, and comprised the largest frozen-meat carriers of the New Zealand Shipping, Shire, Tyser, Federal, and Shaw-Savill Lines. The port is a natural one, possessing good shelter and anchorage with deep water. On account of the depth of water, the port is frequently selected as the final port of departure for fully laden vessels, and in April last the s.s. "Ayrshire" left the port for London drawing 27 ft. 10 in., and with a cargo estimated to be 15,000 tons. Bluff is also known as the first and last port of call for steamers trading with Tasmania and Australia.

Next in size to Invercargill is the inland Town of Gore, situated on the Mataura River, and at the junction of the Main Trunk Railway with the Waimea Plains Branch. Owing to this fact, and to the fertility of the land in the neighbourhood, Gore is rapidly growing in size and importance.

Riverton is a pretty little town, about twenty-five miles from Invercargill, with which it is connected by rail, which runs through to Orepuki and Waihoaka; it is situated on the estuary of Aparima, or Jacob's River. Riverton is the oldest settlement in Southland, and was a great resort for whalers in former years. The harbour is available for and used by coasting-vessels, but the principal carrying-trade is done by rail. There are several sawmills in the neighbourhood, this industry being largely carried on near the many timbered localities in the district.

Otautau, on the banks of the stream bearing the same name, is the county town of Wallace. It is the distributing centre of all that large area of agricultural and pastoral country lying between the Longwood range and the Waiau River, and northwards to the Mararoa River. It has direct communication by rail with Invercargill, Nightcaps, and Orepuki. In Otautau large grain-stores are seen, flour-mills, and a dairy factory, while in the vicinity timber and flax mills are met with. The most direct inland communication with Lakes Manapouri and Te Anau is by road passing through the town and onwards This route is well suited for vehicular traffic, but the favourite or more easy line of communication is by rail from Invercargill to Lumsden and onward by coach as before noticed.

The Village of Nightcaps is reached by a short line of railway from Thornbury, on the Invercargill–Riverton line. A large colliery exists here. (See Industrial, Coal, &c., *ante*.)

The Town of Winton is on the Invercargill–Kingston Railway, about twenty miles distant from Invercargill, and is the centre of a good farming, sawmilling, and coal-mining district. A short line of railway has been opened from here to Hedgehope, an extensive agricultural locality lying some fifteen miles in a westerly direction.

Lumsden is the junction of the Kingston (Lake Wakatipu), Invercargill, and Waimea Plains Railway-lines. Coaches starting from here take passengers and mails to Lakes Manapouri and Te Anau and the surrounding country.

East of Invercargill are Edendale and Wyndham, both with railway connection, and surrounded by rich agricultural country reaching to Fortrose, with good roads. Fortrose is easily reached from Invercargill by the Seaward Bush Railway, which connects with the Wyndham Road at Waimahaka, distant about four miles north of Fortrose. It is surrounded by exceedingly fertile country, and the harbour (estuary of the Mataura River) can be entered by coasting steamers.

Eastward of Fortrose and about midway between that place and Catlin's River is Waikawa, a newly-settled township with a harbour for coasters, and a large area of surveyed Crown land around, with good timber, available for settlement. Steamers trading with Dunedin and Invercargill call here and at Fortrose at regular intervals. A good export of timber occurs at Waikawa.

Crown Lands for Disposal.

The total area of surveyed lands remaining open for selection as on the 31st March, 1904, was 62,561 acres 3 roods 14 perches, comprising the following lands:—

	A.	R.	P.
Town and suburban	767	3	35
Village-homestead settlements	45	2	10
Rural—ordinary	4,234	3	30
,, —bush and swamp	45,437	0	38
Land for settlements	6,254	0	14
Rural—lease in perpetuity	1,710	0	38
,, —bush and swamp (lease in perpetuity)	4,111	3	9
	62,561	3	14
Unsurveyed pastoral runs	1,085,306	0	0
Gross total	1,147,867	3	14

NEW ZEALAND'S EXTENDED BOUNDARIES.

Notes on the Cook and other Islands annexed to New Zealand in 1901.

J. W. Black.

The Pacific islands annexed to this colony in pursuance of resolutions passed by the House of Representatives in September and October, 1900, were Rarotonga, Mangaia, Mauke, Atiu, Aitutaki, Mitiaro, Hervey Islands, Palmerston, Niue, Danger, Rakahanga, Manihiki, Penrhyn, and Suwarrow. Takutea and Nassau, not mentioned in the resolutions, also lie within the boundary-lines prescribed by the Imperial Order in Council and the New Zealand Proclamation dealing with the annexation. Under "The Cook and other Islands Government Act, 1901," the Federal Parliament of the Cook Islands and the several Native Councils were continued under the names "Federal Council" and "Island Councils." The former has power to enact Federal Ordinances for the government of all the islands excepting Niue, while each Island Council can make local Ordinances governing the inhabitants within its jurisdiction. No Ordinance passed in the islands, however, can have the force of law until assented to by the Governor of New Zealand in the name and on behalf of His Majesty; and the Governor has power, by Order in Council, to direct that any of the laws in force in the islands at the commencement of the principal Act shall be repealed or modified. The Governor in Council has power also to apply to the islands any law in force in New Zealand, either in whole or with modifications, excepting the laws relating to alcoholic liquors. The only New Zealand law in force in the islands at present is that relating to Customs duties, and the Governor, by Order in Council, may from time to time modify the tariff as applying to any of the islands.

The laws are enforced through the High Court, which has jurisdiction throughout the whole of the islands excepting Niue, and, in the Cook Group, through the Arikis' Courts. The Arikis' Courts are composed of Native Judges, with the exception of the Arikis' Court at Aitutaki, where no Court is legally constituted unless the European Magistrate is present. The Arikis' Courts deal with all minor offences, but the Resident European Magistrate at Aitutaki has power to hear and determine all civil cases where the matter in issue does not exceed £50 in value. Appeals are allowed from the Arikis' Courts to the High Court. It is probable that steps will be taken to abolish the Arikis' Courts in those islands on which there is a European Resident Agent. The High Court has exclusive jurisdiction in all cases of murder or of assault with intent to commit murder, and in all cases of manslaughter; in all criminal charges against foreign residents; and in all cases between foreign residents, or between foreign residents and Maoris in which the plaintiff may, with the consent of the Chief Judge, begin an action in the Court, or may with the same consent seek redress for any wrong alleged to have been done by any local Government in any island. The Chief Judge has power to send any case of a criminal charge against a foreign resident for trial before a Court constituted under the provisions of the Pacific Order in Council. The headquarters of the High Court are at Rarotonga, where it sits once a week, but visits are periodically made to the other islands within its jurisdiction.

The Act of 1901 placed all the annexed islands under one administration, and Colonel W. E. Gudgeon, C.M.G., who, prior to the annexation, had acted as British Resident, was appointed Resident Commissioner. By the amending Act of 1903 Niue was placed under a separate

administration, and the Federal Council and the High Court of the Cook Islands have now no jurisdiction in that island. Mr. C. F. Maxwell, formerly Resident Agent, is now Resident Commissioner in Niue.

Rarotonga.

Rarotonga is certainly the finest island in the Cook Group, both in point of scenic attractions and in respect of its general productiveness. It is a particularly good specimen of the volcanic order of islands, and the rugged grandeur of its mountain-peaks and the variety and luxuriance of its vegetation combine to present one of the most romantic and picturesque scenes that one could possibly find even in the South Seas, where the romantic and picturesque are supposed to abound. Attaining, as it does, a height of 3,000 ft., the island is well watered; and a belt of rich alluvial soil, varying from one to two miles in width, extends all round from the mountains to the sea. The circumference of Rarotonga is over twenty miles, and it will be seen, therefore, that the area available for cultivation is by no means inconsiderable. The land at present is not being utilised to anything like the full extent of its possibilities; but the Land Titles Court is doing good work, and there seems to be a growing inclination on the part of the Arikis to lease their lands to suitable tenants, preferably Europeans. A considerable portion of the island has been surveyed, and with the advent of a larger European population a steady increase in the yield of the staple products of the island may be looked for. In the case of copra it will be some years before the production can be greatly increased, but the cocoa-palm is being extensively planted, and, given favourable conditions, the results may be awaited with confidence. The banana trade is developing satisfactorily, and as Rarotonga is particularly well adapted to the growth of the banana, the outlook so far as this item is concerned is distinctly hopeful. The coffee industry, which received a check a few years ago in consequence of an attack of leaf-blight, is once more in a satisfactory condition. Avarua, on the north coast, is the principal village on the island, and the seat of the Federal Government and Islands Administration. It is also the port of call for the Union Steam Ship Company's steamer which visits the Group every four weeks. A substantial building is about to be erected here for the accommodation of visitors, and when the island is better known it is hoped that a tourist traffic will be developed. The population of Rarotonga is 1,900, about eighty being Europeans.

Mangaia.

This is one of the largest of the annexed islands, being about thirty miles in circumference, and having an area of some thirty square miles. Given proper landing facilities, it would be in no way behind Rarotonga, except in the lack of that impressive mountain scenery that lends such a charm to the latter island. Mangaia is somewhat peculiar in structure. At a short distance inland from the shore there rises an almost perpendicular wall of dead coral, about 100 ft. high, as if the reef of earlier days had been lifted bodily by some convulsion of nature. This *makatea*, as it is called, runs right round the island, and is perforated by numerous caves and crevices, which in olden times were used as depositories for the dead, as well as for storage and other purposes. These caves still supply, in the calcareous formations in which they abound, the material from which the Natives manufacture some of their household implements. The top of the *makatea* averages about a mile in width, and is well adapted to the growth of the citrus family of fruits. The interior face of this coral rampart slopes down gradually into a basin of rich swamp land containing extensive taro-plantations, and from this the land rises again in a succession of low hills to a central plateau, about 650 ft. high,

known as the "Crown of Mangaia." These taro-swamps still supply most of the food of the Mangaians, although for many years the tribes have lived in the Villages of Oneroa, Tamarua, and Ivirua, on the coast. The interior of the island, which contains some splendid valleys, is well watered by streams which filter through below the base of the *makatea* into the sea. The population, according to the latest returns, is 1,507; and the people are said to display a greater degree of industry than is usual among Natives of the Pacific islands. This fact, combined with the natural resources of the island, promises well for the future prosperity of Mangaia. There are considerable areas of waste land awaiting cultivation, and the Natives are becoming alive to the necessity for planting these with cocoanuts, &c. Citrus fruits are already growing in profusion, and it is estimated that with proper cultivation the output could be increased twenty-fold. Mangaia produces the best coffee in the Group at present. The trade of the island has hitherto been hampered to a considerable extent in consequence of the difficulty in shipping produce. The reef, which encircles the island at a short distance from the shore, is without an opening, and communication between the island and outside can only be obtained by crossing the reef in Native canoes. This process, where cargo is concerned, is necessarily slow and costly—it takes as long to ship 50 tons over the reef at Mangaia as it does to ship 200 tons at Rarotonga—besides which the produce is always liable to be damaged by salt-water. Steps have been taken, however, to have suitable boat-passages blasted in the reef, and the matter is now being attended to by one of the vessels of the Australian Squadron. When this has been accomplished the chief hindrance to the development of the trade of this island will be removed.

There was no Resident Agent at Mangaia until last year, when Mr. J. T. Large was transferred from Aitutaki. There are already indications that his appointment to Mangaia will bring about a very necessary improvement in the conduct of affairs on that island.

Mauke.

This island is low and flat, and a belt of ironwood (*toa*) skirting the island obscures to some extent the cocoanut-palms which are usually one of the most prominent and first-observed features in the landscape of a Pacific island. This ironwood was formerly found in large quantities, and was much sought after by traders. Mauke, like Mangaia, has a fringing reef which, however, does not so readily lend itself to the process of crossing in canoes that obtains in Mangaia. A landing has to be effected on the edge of the reef itself, and one reaches dry land by wading or being carried through the shallow water covering the depression in the coral between the outer edge and the shore. There is a landing at the northern side of the island also, and the Resident Commissioner has arranged for a road to be constructed to connect this with the western side. When this is completed it will be possible to ship goods at almost any time, as it has been found that when the western landing is inaccessible through bad weather the sea at the northern side remains quite smooth. Mauke also has its *makatea*, or raised-coral area, but it merges almost imperceptibly into the volcanic formation of the centre, and the general level of the island all over is about 60 ft. above the sea. The island is small, its area being only about four square miles and a half; but it is remarkably fertile, and, notwithstanding that in common with the other islands of the Group it is very imperfectly planted, it exports 100 tons of copra and 3,500 boxes of oranges annually, an output that exceeds that of Atiu, which is six or seven times its size. There is no Resident Agent on Mauke. The population of the island is 338.

Atiu.

This island is much like Mauke in appearance, having the same high fringing reef and the same dead-coral formation over the greater part of its area. It is much larger, however, its area being about thirty-two square miles, and it has four times as much unused land as Rarotonga. Atiu is a valuable island, and exports good quantities of copra, oranges, coffee, and limejuice. All the usual island fruits grow well, but a fuller development of the resources of the island is retarded through the lack of proper facilities for shipping produce. Arrangements have been made, however, as in the case of Mangaia, to have a boat-passage formed through the reef at the earliest possible moment. The cavernous formation, which is so marked a feature of the *makatea* at Mangaia, is also present in the coral-rock portion of Atiu, and must, no doubt, be found more or less in all islands that owe their existence in any degree to the upheaval of a sea-worn coral reef. The late Ngamaru Ariki was practically King of Atiu, although he had lived for many years in Rarotonga, and as such he exercised a measure of sovereignty over Mauke and Mitiaro, both of which were conquered by the Atiuans prior to the introduction of Christianity. The population of the island is 940 Natives, but this does not represent anything like the total of the Atiuan tribes. They are largely represented in the subordinate islands, as well as in Tahiti. The only white resident is Mr. Adolph von Nagel, who acts as British Resident without salary.

The settlement at Atiu is some distance inland, on the flat summit of the low central hill to which the island rises.

Aitutaki.

Aitutaki combines the features of the volcanic island and the atoll; indeed, it may be regarded as an atoll in course of formation, and it affords a good illustration of the different stages of the process. The island is almost surrounded by a barrier reef, which supports several fruitful islets, and on the south-east lies five miles distant from the land. On the western side it approaches much nearer, the entrance to the Avatapu Channel being about a mile from the wharf at Arutunga, the principal village on the island. At the northern point of the island the reef fringes the shore as in the other main islands of the Cook Group, the barrier stage having not yet been reached. This island approaches more closely to Rarotonga in the general appearance of fertility than any of the others, and it can also claim to possess a considerable degree of scenic attractiveness. It rises somewhat abruptly on the western side to a height of 360 ft., and slopes away gradually to the eastern coast. The area is about seven square miles. The lagoon on the Arutunga side of the island is shallow, and can only be used by vessels of a very small class; but on the eastern side it is much deeper, and freer from coral patches, and there are several places in the reef where, it is believed, a navigable channel might be formed. The land at Aitutaki is divided among the people in small sections; but though each family has quite enough land for its support, it has seldom more than an acre or two in any one place, and the more remote sections are apt to be neglected. The population at present is 1,170, two-thirds of these living in the four settlements on the western side, and the remainder in the Villages of Vaipae and Tautu on the east. The Resident Agent is Mr. J. C. Cameron.

Niue.

Niue is the largest of the annexed islands, having an area of a hundred square miles, and a circumference of forty miles by road. It consists entirely of uplifted coral, and is probably the result of a series of upheavals. In general formation it takes the shape of two terraces, the lower being about 90 ft. above sea-level, and the other about 220 ft.

At Alofi the fringing reef is broken by a narrow boat-passage, partly natural and partly the result of improvements effected by H.M.S. "Mildura" a few years ago. In addition to the one at Alofi, there are landing-places at Avatele and Tuapa, and a boat-passage is being formed at the latter, where Togia, the "King" of Niue resides. Although so rocky that it is for the most part unploughable, Niue is by no means unproductive. All the usual tropical fruits grow well, and large trees are found averaging from 18 in. to 2 ft. 6 in. in diameter, and in some cases attaining a diameter of 4 ft. and running up to 100 ft. in height. Large areas of the island are covered with forest, and it is estimated that there must be millions of feet of timber suitable for milling purposes, including ebony and other hardwoods. A good deal of this timber, however, is situated in rocky country, and it is questionable if it would pay to cut it and bring it out. One of the principal drawbacks to Niue trade in the past has been the lack of good roads connecting the various villages with the principal landing-place, but this difficulty is fast being removed. In addition to a road right round the island, there is now a road through the centre, with branch roads to the settlements on either side, and before long there should be a good system of roads throughout the island. A careful survey of the island was made last year; the roads were traversed throughout, the area of the island determined, and the coast-line defined. There are many extensive caves in Niue, and concerning these Mr. Haszard, the surveyor who visited the island, says: "There is one at Lakepa, I was told, having passages which can be measured by the mile. I was so pushed for time, however, that I was unable to inspect it, but one that I visited at Vaiopeope is extremely beautiful. It is situated about two hundred yards from the sea on the northern coast, and is formed of a number of galleries and terraces, one below the other. Stalactites and stalagmites are in great profusion, and group themselves into all kinds of fantastic shapes. In one gallery the roof appears to be studded with lilies carved out of alabaster. As one descends to the lower galleries the sensation is decidedly weird. The gurgling and reverberations of the swiftly flowing water is heard deep down in dark subterranean channels, which are evidently connected with the sea, for, ever and anon, a mighty gust of wind impelled by the huge rollers breaking on the reef outside, strikes the visitor, and it requires a steady nerve and a firm foothold to avoid being swept into the seething cauldron below. If these caves were in an accessible position they would be a great draw to tourists."

In consequence of the porous nature of the rock there are no streams in Niue, and consequently fresh water is scarce. A supply is obtainable from the caves, but the difficulty of carriage is necessarily considerable, and the water is frequently brackish. Steps are being taken to construct concrete tanks in the principal villages. These will be roofed over with galvanised corrugated iron, and will provide a sufficient catchment-surface to fill them during the rainy season. The people will then have a reliable supply of good drinking-water.

The principal industry on the island is the manufacture of hats. The Natives are very expert plaiters, but the material used—a kind of pandanus—is not the best for the purpose. It is proposed to import the genuine Panama leaf, and if this can be done the hat trade in Niue will be developed immensely. During the year ending the 31st December, 1903, hats to the number of 4,294 dozen were exported from Niue, principally to Auckland, the value represented being £2,962. There is also a good trade done in curios, fungus, and copra, the export of the last-mentioned item for 1903 being 447 tons. The population of Niue may be stated as 4,100, exclusive of some four hundred men at present absent in other islands. The Niueans are naturally of a roving disposition, and numbers of the men go to Tonga, Samoa, Malden Island, &c. Many go under engagement as labourers, and return on the

expiration of their term. The white population numbers about twenty persons. The Resident Commissioner is Mr. C. F. Maxwell, who also acts as Postmaster, Collector of Customs, &c.

Penrhyn.

Penrhyn is a good specimen of the pure atoll. It is merely a ring of coral, about forty-eight miles in circuit, supporting a number of low islands, from 200 to 300 yards across, and enclosing a lagoon of ninety square miles in area, of which twenty-four square miles are more or less covered with pearl-shell. There are three passages into the lagoon, the principal one having a depth of 18 ft. at low water, and there is sufficient wharf accommodation at Omoka for the small class of vessel that visits the island. The other village at Penrhyn, Te Tautua, is some ten miles distant. The pearl-shell fishing is the main industry of the island, but during 1902-1903 100 tons of copra were exported; and Colonel Gudgeon then reported "that from some unexplained cause the cocoanut-palms have suddenly regained their old fertility, and thousands of young trees, planted on land only a few feet above sea-level, are growing as vigorously as those planted on the best alluvial land in Rarotonga." The practice followed with regard to pearl-shell fishing is to divide the lagoon into three parts, which are alternately closed against fishing for a certain period. When the interdiction is removed from any area the Natives may dive without restriction beyond the payment of a small fee to the Government. After the naked diving has been in operation for a time the machines are allowed to be brought into requisition until the limit of time has been reached. That area is then closed, and the same procedure is repeated in another portion of the lagoon. By this means each area is given rest for about a year, and as the shell is said to grow very rapidly at Penrhyn the supply is well maintained. An Ordinance of the Federal Council prohibits the removal of shells of less than 4½ in. in diameter. Over 90 tons of pearl-shell, representing an amount of £9,300, were exported from the northern islands during 1902, and it would be safe to say that the greater part of this came from Penrhyn, from which island alone over 100 tons annually were formerly obtained. The value of the shell ranges from £100 a ton to upwards of £200. The total population is nearly 450, about a dozen being Europeans. The Resident Agent is Captain M. J. Nagle.

Manihiki.

Manihiki is also an atoll, but, unlike Penrhyn, it has no opening through the reef into the lagoon, and when the Natives wish to visit the neighbouring island of Rakahanga their boats have to be carried across the narrow strip of land separating the lagoon from the sea. The island consists of about two square miles of land, encircling a lagoon of some six miles in diameter. A good deal of pearl-shell has been obtained from Manihiki, but about three years ago it was found necessary to close the lagoon, as the shell-beds had been fished almost to the point of exhaustion. The Natives of this island have some reputation for their skill in the manufacture of hats. Walking-sticks, paddles, &c., inlaid with pearl-shell, are also manufactured. The export of copra from Manihiki for 1902-1903 amounted to 135 tons, and as the Natives are beginning to see the wisdom of thinning out the superabundant growth of their palms the production of this item should materially increase. The Native teachers of the London Missionary Society look after the education of the children of the island. The total population is approximately five hundred. Mr. H. Williams acts as Resident Agent.

Mitiaro.

This is a small coral island lying about forty miles to the north-east of Atiu, and an equal distance from Mauke. Its area is only about four square miles, and it nowhere rises higher than 50 ft. above sea-level. It contains some good land, however, and is capable of producing 100 tons of copra annually. Its present annual export is about 70 tons of copra and five hundred boxes of oranges. In the centre is a pretty little lagoon, bordered by a belt of swamp. The population according to the last returns was 218.

Takutea.

This is the smallest island in the Cook Group, its area being about 400 acres. It lies about 125 miles to the north-east of Rarotonga, and close to the Island of Atiu. It belonged to the late Ngamaru Ariki, and was by him presented to His Majesty King Edward for the benefit of his subjects in the Group. The Resident Commissioner proposes to have the island systematically planted with cocoanut-palms, and he anticipates that it will in time yield 200 tons of copra annually. At present it is uninhabited.

Palmerston.

Palmerston is an atoll, with a land-area of one square mile, lying to the north-west of Rarotonga, some 273 miles distant. The reef carries a number of small islets, which are in the occupation of the descendants of the late William Marsters, an old English sailor. One of these, Joel Marsters, acts as Resident Agent, and he and six other members of the family constitute the Island Council. The lagoon, which is about eight miles in diameter, does not carry pearl-shell at present, but it is hoped that spawn may be successfully introduced from other islands. The planting of the land is being well looked after by the Marsters family. The population is 115.

Manuae and Te Au-o-Tu.

These two small islands are enclosed within one reef, and are known as the Hervey Isles—a name that is frequently applied to the Cook Group as a whole. They contain approximately 500 acres and 800 acres respectively of good cocoanut land, and under the careful cultivation of the Cook Islands Trading Company, to whom they are leased, they will ere long produce an immense amount of copra. The islets form a dependency of Aitutaki, about sixty miles distant, by the people of which they were conquered in heathen times. By a recent decision of the Land Titles Court Te Au-o-Tu was awarded to the Arikis of Aitutaki and their clans, seventy-one owners, who claimed the islands by right of conquest; while in the case of Manuae an order was made in favour of the eighty-six descendents of the conquered people, their claim also having been recognised as good. This partition of the islands ends a long-standing contention between the rival claimants, and the judgment is admitted to be an equitable one. The Cook Islands Trading Company's lease runs for twenty-five years from the 7th June, 1898, and the rent will now be shared equally by the owners of the two islands. The population is stated as ten.

Suwarrow.

Suwarrow is a valuable atoll, 530 miles from Rarotonga. Its value lies chiefly in its lagoon, however, the land-area being very small. The lagoon is from eight to ten miles long, and about eight miles across at the widest part, and it makes a splendid harbour, having an entrance sufficiently deep to admit vessels drawing up to 20 ft. of water. The island is under lease to Lever's Pacific Plantations (Limited) "for the

purpose of removing guano or other fertilising substances therefrom, and of planting the land with cocoanuts, and for collecting pearl-shells, and for other purposes of a like nature." A portion of one of the reef islets, known as Anchorage Island, is vested in the Lords Commissioners of the Admiralty as a reserve for naval purposes. Large quantities of pearl-shell of excellent quality have been obtained from the lagoon by the Pacific Trading Company, the predecessors of the present lessees; but diving has been discontinued for some time now, and the shell-beds are being given a long rest, the company having transferred its operations to Christmas Island. It is probable that on the expiry of the present lease in August, 1913, the Islands Government will take over the control of the lagoon, so far, at least, as machine-diving is concerned. It is estimated that one machine will obtain from 40 to 45 tons of shell a year at Suwarrow. There are about thirty people on the island.

Rakahanga.

This island lies about twenty-five miles to the north of Manihiki. It is not so large as its neighbour, and the lagoon does not contain any pearl-shell, but otherwise the two islands are very much alike. They are owned and inhabited by the same people, and what has been said concerning Manihiki is true, for the most part, of Rakahanga also. The duties of Resident Agent are performed by Panapa Wauharangi, a teacher of the London Missionary Society, whose good sense and great influence with the people enable him to fill the position very satisfactorily. Rakahanga exported 160 tons of copra during the year 1902-1903; but here, as in Manihiki, the cocoanut-palms must be judiciously thinned out before the limit of production can be reached. Rakahanga has a population of 400.

Danger (Pukapuka) and Nassau.

Of these two islands, which lie away towards the north-west corner of the annexation boundary, it is not possible to say much at present. Concerning the former Colonel Gudgeon writes, "At Pukapuka I found a very singular population, who have now some knowledge of the Rarotongan language, but whose language is not intelligible to the Maori of the Pacific. This is such a primitive people that I considered it advisable for the present to leave them under their own ancient form of government, inasmuch as they are seldom visited by Europeans, and produce only a little copra." The island is a small atoll of about three miles in diameter, and the lagoon produces some pearl-shell. The population numbers about five hundred. Nassau is owned by a resident of Apia, Samoa.

Education.

The education of the children in these islands is well looked after by the London Missionary Society, the pioneers in all educational and missionary effort in this part of the Pacific. Almost every village of any importance has its school. The most important educational establishment, however, is the high school at Tereora, Rarotonga, where children from all the islands of the Group are received as boarders and given a really good education. The following extract from a recent report by the Resident Commissioner will convey a good idea of the work that is being done in Tereora School, and in the educational institutions generally throughout the islands:—

"During the past year four boys have been selected from this school and employed in the various stores in the island, and I have taken one on as a cadet in the survey office, who promises to become a first-class draughtsman. The master, Mr. P. H. Hall, deserves very great credit for the good English taught in his school, and I feel

assured that Tereora will be to the Cook Islands what Te Aute College is to the young Maoris of New Zealand. A Native of Polynesia is apt to take a very practical view of education, and only values it for the advantages that may thereby accrue to the scholar. Until lately these prospective benefits have not been apparent to the Maori, and therefore many of the most influential people have not taken advantage of the education offered by Tereora; but the sudden demand for reliable and educated boys who can speak both English and Maori has altered all that. Makea is now sending her foster-children to Tereora, and the parents generally are alive to the fact that knowledge may be both power and money, two things that will never be despised in Polynesia.

"The remarks I have made concerning Tereora will apply in a slightly less degree to the Araura School of Aitutaki. This institution is of recent date, but under the management of the Misses Royle is doing good work, while the Rev. Mr. Jones, with characteristic energy and benevolence, prepares the younger children for Araura.

"At Mangaia the Rev. Mr. Bond James is engaged in the same good work, and it may safely be said that wherever the European members of the mission are engaged in the teaching the education given is quite up to the requirements of the islands. This remark can only apply to Rarotonga, Aitutaki, and Mangaia. At Atiu, Mauke, and Mitiaro, where there are no European missionaries, the education of the children must of necessity be left in the hands of the Native teachers. In these cases it is, however, possible to render assistance at a very small cost to the Group, and I propose to employ a few of the smartest boys from Tereora as teachers at a sum not exceeding £20 per annum each, a salary that will be regarded as absolute wealth. For the last eight years we have given an annual subsidy to Tereora of £2 10s. per scholar, provided that not more than fifty scholars were taught in the school. This subsidy was paid with the view of providing food for the children from the outlying islands, but it has been found to be insufficient, and I propose to increase it to £200 per annum. It will be money well spent, for it is from Tereora that the English language will spread over the whole Group."

The Sisters of St. Joseph have a very good school at Avarua, Rarotonga, where music is included among the subjects taught; and in the Village of Titikaveka the Seventh-day Adventists have a school which is well patronised owing to the fact that the lady in charge makes the teaching of English the leading feature of her work.

Revenue and Expenditure.

Cook and Northern Islands.—For the financial year ending the 31st March, 1904, the revenue of the Cook and other Islands, including the balance from the previous year, was £7,169 0s. 8d., and the expenditure £4,558 3s. 9d., leaving a credit balance of £2,610 16s. 11d. In addition to this there is an amount of £421 18s. 6d. outstanding for Land Titles Court fees, so that the real surplus at the 31st March, 1904, was £3,032 15s. 5d. The following is a comparative statement of revenue and expenditure for the past six years:—

Year.	Revenue. £ s. d.	Expenditure. £ s. d.	Surplus. £ s. d.
1898-99 ...	1,801 13 4	1,402 12 5	...
1899-1900	3,165 7 10	2,188 9 10	...
1900-1 ...	4,252 17 11	2,951 14 10	1,301 3 1
*1901-2 ...	4,063 9 6	2,335 7 3	1,728 2 3
1902-3 ...	6,584 13 4	4,725 16 11	1,858 16 5
1903-4 ...	7,169 0 8	4,558 3 9	2,610 16 11

* Figures for 1901–2 are for nine months only.

Niue.—The revenue of Niue for the year ending the 31st March, 1904 (including balance from previous year), was £2,965 6s. 1d., and the expenditure £1,244 11s. 4d., showing a surplus on the year's working of £1,720 14s. 9d. The total funds to the credit of the Niue Government on the 31st March, however, amounted to £2,117 7s. 3d.

Exports and Imports.

Cook and Northern Islands.—The value of exports for the year 1903-1904 was £34,740, while the imports amounted to £34,886. The principal items exported were as follow:—

	£
From the Cook Group—	
Bêche-de-mer, 32 cwt.	48
Coffee, 138,000 lb.	2,310
Copra, 655 tons	5,443
Candlenuts, 113 tons	678
Bananas, 25,843 cases, 10,075 bunches	4,800
Oranges, 60,346 cases	10,050
Pineapples, 5,663 cases	900
Fruit, unenumerated, 282 cases	40
Limejuice, 29,000 gallons	1,250
From the northern islands—	
Copra, 450 tons	3,870
Pearl-shell, 50 tons	4,000

The amount of the imports is made up as follows:—

From New Zealand	25,803
,, United Kingdom	2,089
,, New South Wales	879
,, Victoria	298
,, United States	1,256
,, Germany	193
,, France	79
,, Tahiti	4,289
	£34,886

Niue.—The exports for 1903 amounted to £7,651 18s. 2d., and the imports to £8,001 2s. 6d. The items of export were,—

	£	s.	d.
Copra, 447 tons	4,093	8	5
Hats, 4,293⅔ dozen	2,961	10	9
Fungus, 27,267 lb.	331	17	7
Curios	251	4	1
Arrowroot, 981 lb.	10	4	7
Kava, &c.	3	12	9
	7,651	18	2

The imports represented—

	£	s.	d.
From New Zealand	5,592	0	10
,, Sydney	1,539	0	1
,, Tonga	302	15	6
,, Samoa	68	3	4
,, Malden Island	265	14	5
,, Germany	233	8	4
	£8,001	2	6

APPENDIX.

PRINCIPAL EVENTS.

DATES OF SOME OF THE PRINCIPAL EVENTS IN THE HISTORY OF NEW ZEALAND.

Dec. 13, 1642.—Discovery of New Zealand by Abel Jansen Tasman.

Oct. 8, 1769.—Captain Cook landed at Poverty Bay on his first visit.

June 30, 1788.—Macaulay and Curtis Islands, of the Kermadec Group, discovered by Captain Sever, of H.M. transport "Lady Penrhyn."

Nov. 29, 1790.—Chatham Islands discovered by Lieutenant Broughton, in H.M.S. "Chatham."

Nov. 17, 1793.—Captain d'Entrecasteaux, with the "La Recherche" and "L'Espérance," discovered Raoul or Sunday Island. (The latter name was given by Captain Raven, of the transport "Britannia," who visited the island 6th Nov., 1796.)

Nov., 1793.—Lieutenant-Governor King's (of Norfolk Island) visit to Doubtless Bay.

1795.—The ship "Endeavour," Captain Bampton, sunk at Facile Harbour Dusky Sound.

1800.—Antipodes Island discovered by Captain Pendleton.

1806.—Auckland Isles discovered by Captain Briscow, ship "Ocean," one of Enderby's whalers.

1806.—Ship "Venus" visited East Coast of New Zealand. She was taken by convicts at Port Dalrymple, Tasmania. Their visits gave rise to the Nga-Puhi southern expedition.

1807.—Defeat of Hongi and Nga-Puhi tribe at Moremonui, 10 miles south of Maunganui Bluff, Kaipara.

1809.—The taking and burning of the transport "Boyd" at Whangaroa.

1810.—Campbell Island discovered by Captain F. Haselburg, of brig "Perseverance."

1814.—First arrival of the Rev. Mr. Marsden at Bay of Islands, and introduction of Christianity. Horses, oxen, sheep, and poultry first brought to the colony.

Aug., 1815.—Attempted capture of the "Trial" and "Brothers" at Kennedy Bay.

1818.—Hongi's and Te Morenga's great expedition to East Cape.

1819–20.—Patuone, Nene, and Te Rauparaha's raid on Taranaki and Port Nicholson.

1820.—Hongi visited England; returned to New Zealand July, 1821.

1820.—H.M. store-ship "Coromandel" visited Coromandel.

1820.—Rev. S. Marsden travelled from Wai-te-mata *viâ* Kaipara to the Bay of Islands—the first white man to do so.

Aug., 1820.—The "Prince Regent" entered Auckland Harbour—the first vessel to do so.

Nov., 1821.—Fall of Mauinaina Pa, Auckland Isthmus, to Hongi.

Nov., 1821.—Ngati-Toa migration from Kawhia to Otaki under Te Rauparaha.

Dec., 1821.—Fall of Te Totara Pa, Thames, to Hongi.

May, 1822.—Fall of Matakitaki Pa, Waikato, to Hongi.

May, 1823.—Fall of Mokoia Pa, Rotorua Lake, to Hongi.

1823, 1828.—Acts passed by the Imperial Parliament extending the jurisdiction of the Courts of justice in New South Wales to all the British subjects in New Zealand.

1824.—Fall of Te Whetumatarau Pa, near East Cape, to Pomare.

1825.—First attempt at colonisation by an expedition under the command of Captain Herd, who bought two islands in the Hauraki Gulf.

Feb., 1825.—Great defeat of Ngati-Whatua at Te Ikaaranganui, Kaipara, by Hongi.

1827.—Destruction of mission-station at Whangaroa by Hongi's forces.

Feb., 1827.—Admiral (then Captain) Dumont D'Urville anchored in Auckland Harbour.

1828.—Hongi died at Whangaroa, from wounds received at Hokianga.

1828.—The "Maquarie," Captain Kent, the first vessel to enter Kawhia.

March, 1829.—Brig "Hawes" captured at Whakatane by Maoris.

1830.—Battle of Taumata-wiwi, near Cambridge.

1830.—Fall of Kaiapohia Pa, Canterbury.

March 6, 1830.—Battle of Kororareka, between two Nga-Puhi tribes.

Dec., 1830.—Death of Tama-i-hara-nui at the hands of Te Rauparaha's people. He was brought from Port Cooper by Captain Steward, brig "Elizabeth."

1831.—Tory Channel whaling-station established.

1831.—Application of thirteen chiefs for the protection of King William the Fourth.

Dec., 1831.—Pukerangiora Pa, Waitara, fell to Waikato.

Feb., 1832.—Repulse of Waikato at Nga-motu Pa, under Dicky Barrett.

1833.—Mr. Busby appointed British Resident, to live at the Bay of Islands.

1834.—Battle of Haowhenua and Pakakutu, near Otaki.

1834.—Bishop Williams's first visit to East Cape.

April 29, 1834.—"Harriet" wrecked at Cape Egmont.

Oct. 1, 1834.—H.M.S. "Alligator" shelled and took Waimate Pa, near Opunake. First occasion of H.M. troops being employed in New Zealand.

1835.—Declaration of independence of the whole of New Zealand as one nation, with the title of "The United Tribes of New Zealand."

Nov. and Dec., 1835.—Ngati-Awa tribes migrated to and conquered the Chatham Islands.

March 28, 1836.—Maketu Pa, Bay of Plenty, fell to Waikato.

May 9, 1836.—Te Tumu Pa, Bay of Plenty, fell to Te Arawa.

Aug. 5, 1836.—Battle at Matai-puku, Rotorua—Waikato beat Te Arawa.

Oct., 1836.—Siege of Toka-a-kuku, Te Kaha, Bay of Plenty.

1838.—The Roman Catholic Bishop Pompallier, with several priests, arrived at Hokianga.

Sept. 1, 1838.—H.M.S. "Pelorus" discovers Pelorus Sound.

April, 1839.—Taking of the French whaler "Jean Bart" at Chatham Islands by Maoris.

May 12, 1839.—Departure of the preliminary expedition of the New Zealand Company from England.

June, 1839.—Issue of Letters Patent authorising the Governor of New South Wales to include within the limits of that colony any territory that might be acquired in sovereignty by Her Majesty in New Zealand.

Sept. 16, 1839.—First body of New Zealand Company's emigrants sailed from Gravesend.

Sept. 20, 1839.—Arrival in Port Nicholson of the preliminary expedition of the New Zealand Company under Colonel Wakefield.

Oct. 16, 1839.—Battle of Te Kuititanga, Otaki.

Jan. 20, 1840.—First steamer arrived in New Zealand.

Jan. 22, 1840.—Arrival of first body of immigrants at Port Nicholson.

Jan. 29, 1840.—Captain Hobson, R.N., arrived at the Bay of Islands. On the following day (Jan. 30) he hoisted the Union flag, and read the commission, under the Great Seal of the United Kingdom, which extended the boundaries of the Colony of New South Wales so as to embrace and comprehend the Islands of New Zealand; also his own commission as Lieutenant-Governor over territory that might be acquired in sovereignty.

Feb. 5, 1840.—Treaty of Waitangi signed.

May 21, 1840.—Date of Proclamations of sovereignty over the Islands of New Zealand.

June 17, 1840.—The Queen's sovereignty over the Middle Island formally proclaimed at Cloudy Bay, by Major Bunbury, H.M. 80th Regiment, and Captain Nias, R.N.

Aug. 11, 1840.—The British flag hoisted at Akaroa by Captain Stanley, R.N., and British authority established. The French frigate "L'Aube" arrived there on the 13th August, and the vessel "Comte de Paris," with fifty-seven immigrants, on the 16th August, in order to establish a French colony.

Sept. 18, 1840.—The British flag hoisted at Auckland. The Lieutenant-Governor's residence established there.

1840.—Formation of Wanganui settlement under the name of "Petre."

Feb. 12, 1841.—Issue of charter of incorporation to the New Zealand Company.

Mar. 31, 1841.—Arrival of first New Plymouth settlers.

May 3, 1841.—New Zealand proclaimed to be independent of New South Wales.

Oct., 1841.—Selection of site for settlement at Nelson.

Feb. 1, 1842.—Settlement founded at Nelson.

May 29, 1842.—Arrival of Bishop Selwyn in the colony.

Sept. 10, 1842.—Death of Governor Hobson. Lieutenant Shortland, R.N., Colonial Secretary, became Acting-Governor until the arrival of Captain Fitzroy.

June, 1843.—Affray with Natives at the Wairau, and massacre by Rangihaeata of Captain Wakefield, R.N., agent at Nelson of the New Zealand Company, and others, who had surrendered.

Dec. 1, 1843.—Arrival of Captain Fitzroy, R.N., as Governor.

July 8, 1844.—The Royal flagstaff at Kororareka cut down by Heke.

March 10, 1845.—Attack on and destruction of Town of Kororareka by Heke.

Oct. 1, 1845.—Receipt of despatch notifying recall of Governor Fitzroy.

Nov. 14, 1845.—Arrival of Captain Grey, as Lieutenant-Governor of the colony, from South Australia.

Jan. 11, 1846.—Capture of pa at Ruapekapeka, Bay of Islands, and termination of Heke's war.

Mar. 3, 1846.—Commencement of Native hostilities in the Hutt Valley, near Wellington.

May 16, 1846.—Attack by Natives on a military outpost in the Hutt Valley.

July 23, 1846.—Capture of Te Rauparaha at Porirua, near Wellington. He was detained for a year as a prisoner on board a ship of war.

Aug. 28, 1846.—The New Zealand Government Act passed by the Imperial Parliament, under which a charter was issued dividing the colony into two provinces, and granting representative institutions.

May 19, 1847.—Attack by Natives on settlement of Wanganui.

Jan. 1, 1848.—Captain Grey sworn in as Governor-in-Chief over the Islands of New Zealand, also as Governor of the Province of New Ulster and Governor of the Province of New Munster.

Jan. 3, 1848.—Major-General Pitt appointed by Governor Grey to be Lieutenant-Governor of the Province of New Ulster.

Jan. 28, 1848.—Assumption by Lieutenant-Governor E. J. Eyre, at Wellington, of the administration of the Government of the Province of New Munster.

Feb. 21, 1848.—Peace ratified at Wanganui.

Mar. 7, 1848.—Suspension by Imperial statute of that part of the New Zealand Government Act which had conferred representative institutions.

Mar., 1848.—Otago founded by a Scotch company under the auspices of the Free Church of Scotland.

Oct., 1848.—Severe earthquake at Wellington.

July, 1850.—Surrender of the New Zealand Company's charter, all its interests in the colony reverting to the Imperial Government.

Dec., 1850.—Canterbury founded by the Canterbury Association in connection with the Church of England.

Jan. 8, 1851.—Death of Major-General Pitt, Lieutenant-Governor of the Province of New Ulster.

April 14, 1851.—Lieutenant-Colonel Wynyard appointed Lieutenant-Governor of the Province of New Ulster.

1852.—Discovery of gold at Coromandel by Mr. Charles Ring.

June 30, 1852.—The Constitution Act passed by the Imperial Parliament, granting representative institutions to the colony, and subdividing it into six provinces.

Jan., 1853.—Promulgation of the Constitution Act.

Mar. 7, 1853.—Assumption by Sir George Grey, K.C.B., of the duties of Governor of the colony, in terms of the appointment after the passing of the New Zealand Constitution Act, and cessation of the duties of the Lieutenant-Governors of New Ulster and New Munster.

Dec. 31, 1853.—Departure of Governor Sir George Grey.

Jan. 3, 1854.—Lieutenant-Colonel Wynyard assumed the administration of the Government.

May 27, 1854.—Opening at Auckland of the first session of the General Assembly by Lieutenant-Colonel Wynyard, Administrator of the Government.

Jan., 1855.—Very severe earthquake on each side of Cook Strait.

Sept. 6, 1855.—Arrival of Governor Colonel T. Gore Browne, C.B.

Nov. 12, 1855.—First members elected to House of Representatives under system of Responsible Government.

Aug. 8, 1855.—General Assembly opened.

Sept. 15, 1855.—General Assembly prorogued.

May 7, 1856.—Appointment of the first Ministry under the system of Responsible Government, under Mr. Sewell, Colonial Secretary.

May 14, 1856.—Defeat of Mr. Sewell's Ministry.

May 20, 1856.—Appointment of a Ministry under presidency of Mr. W. Fox, as Attorney-General.

May 28, 1856.—Defeat of Mr. Fox's Ministry, by a majority of one, on a direct vote of want of confidence.

June 2, 1856.—Appointment of a Ministry under the presidency of Mr. E. W. Stafford.

1857.—First payable goldfield in the colony opened at Collingwood, in the Nelson Province.

Aug. 21, 1858.—New Provinces Act passed.

Nov. 1, 1858.—Establishment of the Province of Hawke's Bay.

Dec. 22, 1858.—The Austrian exploring frigate "Novara" arrived in Auckland Harbour. Dr. Ferdinand von Hochstetter, at the request of the New Zealand Government, was commissioned to make geological surveys of the greater part of Auckland and Nelson Provinces.

March, 1859.—Te Teira offered land at Waitara for sale to the Government.

Nov. 1, 1859.—Establishment of the Province of Marlborough.

Mar., 1860.—Commencement of hostilities against Wiremu Kingi te Rangitake at Waitara.

Mar. 18, 1860.—Capture of Maori pa at Waitara.

Mar. 28, 1860.—Engagement at Waireka.

June 27, 1860.—Engagement of Puketakauere at Waitara.

Nov. 6, 1860.—Defeat at Mahoetahi, with heavy loss, of a force of Waikato Natives, who had crossed the Waitara River to join Wiremu Kingi.

Dec. 31, 1860.—Capture of the Matarikoriko Pa, and defeat of a large body of Waikato Natives.

Jan. 23, 1861.—The Natives made a determined attack on the redoubt at Huirangi occupied by Imperial troops, and were repulsed with heavy loss.

April 1, 1861.—Establishment of Province of Southland.

May 21, 1861.—A truce agreed to.

May, 1861.—Discovery of gold at Gabriel's Gully, Otago.

July 5, 1861.—Defeat of Mr. Stafford's Ministry, by a majority of one, on a vote of want of confidence.

July 12, 1861.—Appointment of a Ministry under the premiership of Mr. Fox.

July 29, 1861.—Incorporation of the Bank of New Zealand.

Sept. 26, 1861.—Arrival of Sir George Grey, K.C.B., at Auckland, from the Cape Colony, to succeed Governor Gore Browne. Sir George Grey was sworn in as Governor on the 3rd October.

Oct. 2, 1861.—Departure of Governor Gore Browne.

June 28, 1862.—Coromandel proclaimed a goldfield.

June 29, 1862.—Wreck of s.s. "White Swan" on East Coast (with loss of many public records, in transit from Auckland).

July 28, 1862.—Defeat of Mr. Fox's Ministry by the casting-vote of the Speaker, on a proposed resolution in favour of placing the ordinary conduct of Native affairs under the administration of the Responsible Ministers.

Aug. 6, 1862.—Appointment of a Ministry under the leadership of Mr. Alfred Domett.

Feb. 7, 1863.—Wreck of H.M.S. "Orpheus" on Manukau Bar; 181 lives lost.

Feb. 26, 1863.—Definite relinquishment by the Imperial Government of control over administration of Native affairs.

May 4, 1863.—Treacherous assault near Tataraimaka by Natives on a military escort. Murder of Lieutenant Tragett, Dr. Hope, and five soldiers of the 57th Regiment.

June 4, 1863.—Defeat of Natives at Katikara, by a force under Lieut.-General Cameron.

July 17, 1863.—Action at Koheroa, in the Auckland Province. Commencement of the Waikato War.

Oct. 27, 1863.—Resignation of the Domett Ministry, in consequence of difficulties experienced in connection with arrangements for finding a fitting representative of the Government in the Legislative Council.

Oct. 30, 1863.—Appointment of the Ministry formed by Mr. Fox, under the premiership of Mr. F. Whitaker.

Nov., 1863.—Acceptance by the General Assembly of colonial responsibility in Native affairs.

Nov. 20, 1863.—Battle of Rangiriri. Defeat of Natives and unconditional surrender of 183.

Dec. 1, 1863.—The first railway in New Zealand opened for traffic by Mr. Samuel Bealey, Superintendent of Canterbury. The line was from Christchurch to Ferrymead Junction.

Dec. 3, 1863.—The New Zealand Settlements Act passed, giving the Governor power to confiscate the lands of insurgent Natives.

Dec. 8, 1863.—Occupation of Ngaruawahia. The British flag hoisted on the Maori king's flagstaff.

Feb. 11, 1864.—Engagement with Natives on Mangapiko River. Major (then Captain) Heaphy, of the New Zealand Forces, won the Victoria Cross for distinguished bravery on this occasion.

Feb. 22, 1864.—Defeat of Natives at Rangiaohia.

April 2, 1864.—Attack on and capture of pa at Orakau, Waikato.

April 21, 1864.—Engagement near Maketu, Bay of Plenty. Tribes of the Rawhiti defeated by Arawa Natives, under Captain McDonnell.

April 29, 1864.—Assault on Gate Pa, Tauranga, Bay of Plenty, and repulse of large British force by the Maoris. The pa was abandoned by the Natives during the following night.

April 30, 1864.—Repulse of attack by rebel Hauhau Natives on redoubt at Sentry Hill, Taranaki.

May 14, 1864.—Battle of Moutoa, an island in the Wanganui River, between friendly and rebel Hauhau Natives. Complete defeat of rebels.

June 21, 1864.—Engagement at Te Ranga, near Tauranga, by Lieut.-Colonel Greer, 68th Regiment. Severe defeat of the Natives.

1864.—Discovery of gold on the west coast of the Middle Island.

Sept. 10, 1864.—Escape of Maori prisoners from Kawau.

Oct. 3, 1864.—Wellington chosen as the seat of Government.

Nov. 24, 1864.—Appointment of a Ministry under the premiership of Mr. F. A. Weld, the Whitaker-Fox Ministry having resigned during the recess.

Dec. 17, 1864.—Confiscation of Native lands in Waikato by Sir George Grey.

Feb., 1865.—Removal of the seat of Government to Wellington.

March 2, 1865.—Barbarous murder of the Rev. Mr. Volkner, a Church of England missionary, at Opotiki, by Hauhau fanatics, under Kereopa.

June 8, 1865.—Submission of the Maori Chief Wiremu Tamihana te Waharoa (William Thompson).

June 17, 1865.—Murder of Mr. Fulloon, a Government officer, and his companions, at Whakatane, by Hauhau fanatics.

July 22, 1865.—Capture of the Wereroa Pa, near Wanganui.

Aug. 2, 1865.—Assault and capture of the Pa Kairomiromi, at Waiapu, by Colonial Forces under Captain Fraser, and Native Contingent under the chief Te Mokena. Eighty-seven rebels killed.

Sept. 2, 1865.—Proclamation of peace issued by Governor Sir George Grey, announcing that the war, which commenced at Oakura, was at an end.

Sept. 30, 1865.—Murder by Hauhaus, at Kakaramea, of Mr. Broughton, when sent as friendly messenger to them by Brigadier-General Waddy.

Oct. 12, 1865.—Resignation of Mr. Weld's Ministry, on account of a resolution adverse to the Government policy, having been defeated only by the casting-vote of the Speaker.

Oct. 16, 1865.—Appointment of a Ministry under the premiership of Mr. E. W. Stafford.

Dec. 25, 1865.—Defeat of rebel Natives at Wairoa, Hawke's Bay, by Colonial Forces and Native Contingent.

Jan. 4, 1866.—Defeat of Natives at Okotuku Pa, on the west coast of the North Island, by force under Major-General Chute.

Jan. 7, 1866.—Assault on and capture of Putahi Pa, by force under Major-General Chute.

Jan. 13, 1866.—Assault on and capture of Otapawa Pa, by force under Major-General Chute.

Jan. 17, 1866, to Jan. 25, 1866.—Period of Major-General Chute's march through the bush to New Plymouth.

Jan., 1866.—Escape of a large number of Native prisoners from the hulk at Wellington; many were drowned in trying to swim ashore.

March 29, 1866.—Submission of the rebel chiefs Te Heuheu and Herekiekie of Taupo district.

Mar., 1866.—A detachment of Maori prisoners sent to the Chatham Islands.

June 15, 1866.—Commencement of Panama steam mail-service.

Aug. 26, 1866.—The Cook Strait submarine telegraph cable laid.

Oct. 2, 1866.—Engagement with rebel Natives at Pungarehu, West Coast, by Colonial Forces, under Major McDonnell.

Oct. 8, 1866.—First Act passed to impose stamp duties.

Oct. 12, 1866.—Defeats of rebel Natives at Omaranui and at Petane, Hawke's Bay, by Colonial Forces.

Oct. 10, 1867.—An Act passed to establish an institute for the promotion of science and art in the colony.

Oct. 10, 1867.—An Act passed for the division of the colony into four Maori electorates, and the admission of four Maori members to the House of Representatives.

Jan., 1868.—Establishment of the County of Westland.

Feb. 5, 1868.—Arrival of Governor Sir George F. Bowen, G.C.M.G.

July 4, 1868.—Seizure by Maori prisoners, under the leadership of Te Kooti, of the schooner "Rifleman," and their escape from the Chatham Islands.

July 12, 1868.—Night attack by Natives on redoubt at Turuturu Mokai. Sub-Inspector Ross and seven Europeans killed. Natives driven off by the arrival of a force under Major Von Tempsky.

Aug. 8, 1868.—Pursuit by Lieut.-Colonel Whitmore of escaped Chatham Island prisoners, and indecisive engagement in the gorge of the Ruake Ture.

Aug. 21, 1868.—Attack on Ngutu-o-te-Manu by force under Lieut.-Colonel McDonnell. Defeat of Natives; four Europeans killed and eight wounded.

Sept. 7, 1868.—Engagement in bush at Ngutu-o-te-Manu. Major Von Tempsky, Captains Buck and Palmer, Lieutenants Hunter and Hastings, and fourteen men killed.

Oct. 19, 1868.—Bishop Selwyn left New Zealand.

Nov. 7, 1868.—Attack on Moturoa. Repulse of Colonial Forces, with severe loss.

Nov. 10, 1868.—Massacre of thirty-two Europeans at Poverty Bay by Te Kooti's band of Natives, who had escaped from the Chatham Islands.

Nov. 24, 1868, Dec. 3, 1868, Dec. 5, 1868.—Engagements between friendly Natives and rebels under Te Kooti, at Patutahi, Poverty Bay district.

Jan. 5, 1869.—Assault on and capture of Ngatapa Pa, Poverty Bay district, after a siege of six days, by the Colonial Forces of Europeans and friendly Natives under Colonel Whitmore and Major Ropata. Dispersion and pursuit of Te Kooti's band. More than 136 rebel Natives were killed.

Feb. 13, 1869.—Treacherous murder of the Rev. John Whitely and seven other Europeans at the White Cliffs, Taranaki.

Feb. 18, 1869.—Attack by rebel Natives on a foraging-party at Karaka Flat one sergeant and six men killed.

Mar. 3, 1869.—Termination of Panama mail-service.

Mar. 13, 1869.—Attack on and defeat of Titokowaru's force at Otauto.

April 10, 1869.—Native pa at Mohaka taken by Te Kooti, who killed forty friendly Natives and several Europeans in the neighbourhood.

April 12, 1869.—First arrival of H.R.H. the Duke of Edinburgh in Wellington, in H.M.S. "Galatea."

May 6, 1869.—Surprise and capture of Ahikereru and Oamaru Teangi Pas, Waiwera country. Defeat of Te Kooti.

June 13, 1869.—Surrender to Major Noake and Mr. Booth, R.M., of the chief Tairua, with 122 men, women, and children of the PakakoheTribe, near Wanganui.

June 24, 1869.—Defeat of Mr. Stafford's Ministry on a want-of-confidence motion.

June 28, 1869.—Appointment of a Ministry under the premiership of Mr. W. Fox.

Sept. 3, 1869.—An Act passed providing Government life insurance and annuities.

Oct., 1869.—Seventy-four prisoners from the bands of Te Kooti and Titokowaru sentenced to death, after trial, for treason. The sentences of seventy-three were commuted to penal servitude for various terms.

Oct. 4, 1869.—Pourere Pa stormed and taken by Lieut.-Colonel McDonnell, with a mixed force of Europeans and Natives.

Jan., 1870.—Three hundred friendly Natives under Topia, and three hundred under Major Keepa (known as Kemp), started up the Wanganui River in pursuit of Te Kooti, who retreated into the Urewera country.

Jan. 25, 1870.—Capture of Tapapa Pa, occupied by Te Kooti.

Feb. 24, 1870.—The last detachment of the Imperial troops left the colony.

Mar. 25, 1870.—Major Keepa, with Native force, captured the position held by Te Kooti at Maraetahi, in Urewera country; nineteen rebels killed and seventy-three of Te Kooti's men taken prisoners. Te Kooti escaped with twenty followers.

Mar. 26, 1870.—Commencement of San Francisco mail-service.

June 28, 1870.—Enunciation in the House of Representatives of the public-works policy by the Colonial Treasurer, Mr. Vogel.

July, 1870.—Thirty prisoners of Te Kooti's band sentenced to death. The sentences were commuted to penal servitude.

Aug. 27, 1870.—Arrival in Wellington of H.R.H. the Duke of Edinburgh in H.M.S. "Galatea." Second visit.

Sept. 12, 1870.—An Act passed to establish the New Zealand University.

Sept. 12, 1870.—The Land Transfer Act passed, to simplify the title to land and dealings with real estates.

Oct. 6, 1870.—Southland Province reunited with Otago.

Dec. 5, 1870.—Honiani te Puni, the chief of the Ngatiawas, a staunch friend of the Europeans, died at Petone, near Wellington, aged ninety years.

Mar., 1871.—Commencement of railway-construction under the public-works policy.

Aug. 4, 1871.—Death of Tamati Waka Nene, the great Ngapuhi chief and friend of the Europeans.

Nov., 1871.—Capture of the notorious rebel Kereopa, the murderer of the Rev. Mr. Volkner, by the Ngatiporous.

Jan. 5, 1872.—Execution of Kereopa at Napier.

Jan., 1872.—Remission of sentences on fifty-eight Native prisoners then undergoing imprisonment for rebellion.

Feb. 22, 1872.—Visit of William King, the Maori chief of Waitara, to New Plymouth, and resumption of amicable relations with the Europeans.

May 9, 1872.—A general thanksgiving-day for the recovery of H.R.H. the Prince of Wales.

Sept. 6, 1872.—Defeat and resignation of Mr. Fox's Ministry.

Sept. 10, 1872.—Appointment of a Ministry under the premiership of the Hon. E. W. Stafford.

Oct. 4, 1872.—Defeat of the Stafford Ministry on a vote of want of confidence moved by Mr. Vogel.

Oct. 11, 1872.—Appointment of a Ministry under the premiership of the Hon. G. M. Waterhouse, M.L.C.

Oct. 11, 1872.—First appointment of Maori chiefs (two) to be members of the Legislative Council.

Oct. 25, 1872.—The Public Trust Office Act passed.

Jan., 1873.—Establishment of the New Zealand Shipping Company.

Mar. 3, 1873.—The Hon. W. Fox appointed Premier on the resignation of that office by the Hon. G. M. Waterhouse, the other members of the Ministry being confirmed in their offices.

Mar. 19, 1873.—Departure of Governor Sir G. F. Bowen, G.C.M.G.

Mar. 21, 1873.—Assumption of the Government by Sir G. A. Arney, Chief Justice, as Administrator.

April 8, 1873.—Resignation of the premiership by the Hon. W. Fox, on the return of the Hon. J. Vogel, C.M.G., from Australia. Appointment of Mr. Vogel as Premier, the other Ministers being confirmed in their offices.

June 14, 1873.—Arrival of Governor Sir J. Fergusson, P.C.

Aug. 22, 1874.—The Imprisonment for Debt Abolition Act passed.

Nov. 27, 1874.—Sir James Fergusson left New Zealand.

Dec. 3, 1874.—Arrival of Governor the Marquis of Normanby, P.C.

1874.—31,774 immigrants were introduced this year under the immigration and public-works policy.

Jan. 3, 1875.—Visit of Sir Donald McLean to the Maori king; resumption of amicable relations.

July 6, 1875.—Resignation of the Ministry, in consequence of the absence of Sir J. Vogel, K.C.M.G., in England, and his being unable to attend the session of Parliament. Reconstitution thereof, under the premiership of the Hon. Dr. Pollen, M.L.C.

July, 1875.—Establishment of the Union Steam Shipping Company of New Zealand.

1875.—18,324 immigrants were introduced this year under the immigration and public-works policy.

Oct. 12, 1875.—The Abolition of Provinces Act passed.

Feb. 15, 1876.—Resignation of the Hon. Dr. Pollen's Ministry, and reconstitution under the premiership of Sir J. Vogel, K.C.M.G.

Feb. 18, 1876.—Completion of the work of laying the telegraph cable between New Zealand and New South Wales..

June, 1876.—Death of Dr. Isaac Earl Featherston, while acting as Agent-General for the colony in England. He was the first to hold that office, and had previously been Superintendent of the Province of Wellington from the time of the first establishment of provincial representative institutions.

Sept. 1, 1876.—Resignation of Sir J. Vogel's Ministry in view of the appointment of Sir J. Vogel as Agent-General. Formation of a Ministry under the premiership of Major Atkinson.

Sept. 13, 1876.—Resignation of Major Atkinson's Ministry in consequence of doubts being entertained as to the constitutional position thereof. Reconstruction of the Ministry under the premiership of Major Atkinson.

Nov. 1, 1876.—"The Abolition of Provinces Act, 1875," came into full operation. Complete abolition of provincial institutions. The colony subdivided into counties and municipal boroughs.

Oct. 8, 1877.—Defeat of the Atkinson Ministry on a vote of want of confidence moved by Mr. Larnach.

Oct. 15, 1877.—Appointment of a Ministry under the premiership of Sir George Grey, K.C.B.

Nov. 29, 1877.—The Education Act, providing for the free and compulsory education of children, passed.

April 11, 1878.—Bishop Selwyn died, in England.

Oct. 29, 1878.—Sir George Grey's first land-tax passed.

Feb. 29, 1879.—Departure of Governor the Marquis of Normanby, P.C.

Mar., 1879.—Removal of surveyors from the Waimate Plains by Natives acting under Te Whiti's orders.

Mar. 27, 1879.—Arrival of Governor Sir Hercules G. R. Robinson, G.C.M.G.

May 25, 1879.—The Natives from Parihaka, by order of Te Whiti, began ploughing up lands occupied by Europeans.

June, 1879.—Arrest and imprisonment of 180 of these Natives for causing disturbances.

July 29, 1879.—Defeat of the Grey Ministry on an amendment to the Address in Reply, moved by Sir William Fox, followed by a dissolution of Parliament.

Oct. 3, 1879.—Defeat and subsequent resignation of Sir George Grey's Ministry.

Oct. 8, 1879.—Appointment of a Ministry under the premiership of the Hon. John Hall.

Dec. 19, 1879.—An Act passed to assess property for the purpose of taxation.

Dec. 19, 1879.—The Triennial Parliament Act passed.

Dec. 19, 1879.—An Act passed to qualify every resident male of twenty-one years of age and upwards to vote.

June, 1880.—First portion of the Parihaka Maori prisoners released by the Government.

July 9, 1880.—Bounty Island taken possession of by Captain George Palmer H.M.S. "Rosario."

Sept. 8, 1880.—Departure of Governor Sir Hercules G. R. Robinson, G.C.M.G.

Oct. 1880.—Release of the last portion of the Parihaka Maori prisoners.

Oct. 26, 1880.—Sir Francis Dillon Bell appointed Agent-General.

Nov. 29, 1880.—Arrival of Governor Sir A. H. Gordon, G.C.M.G.

April 29, 1881.—"Tararua," steamer, wrecked; 130 lives lost.

June 26, 1881.—Severe earthquakes in Wellington.

Nov. 5, 1881.—March of force of Constabulary and Volunteers on Parihaka, and arrest of Te Whiti and Tohu, without bloodshed.

Feb. 15, 1882.—First shipment of frozen meat made from Port Chalmers. (See Year-book, 1893, p. 192.)

April 21, 1882.—Resignation (during the recess) of the Hon. J. Hall's Ministry, and its reconstruction under the premiership of the Hon. F. Whitaker, M.L.C.

June 23, 1882.—Departure of Governor Sir A. H. Gordon.

June 24, 1882.—Assumption of the Government by Sir J. Prendergast, Chief Justice.

Jan. 20, 1883.—Arrival of Governor Sir W. F. D. Jervois, G.C.M.G., C.B.

Jan. 26, 1883.—A direct line of steam-communication between England and New Zealand inaugurated by the New Zealand Shipping Company.

Feb. 13, 1883.—Proclamation of amnesty to Maori political offenders.

Feb. 19, 1883.—Liberation of Te Whiti and Tohu.

Sept. 25, 1883.—Resignation of the office of Premier and his seat in the Ministry by the Hon. F. Whitaker, and the appointment of the Hon. Major H. A. Atkinson to be Premier, the members of Mr. Whitaker's Ministry being confirmed in their offices.

June 11, 1884.—Defeat of Major Atkinson's Government.

June 27, 1884.—Dissolution of the General Assembly.

Aug. 16, 1884.—Resignation of Major Atkinson's Ministry in consequence of the result of the general election. Formation of a Ministry under the premiership of Mr. Robert Stout.

Aug. 20, 1884.—Defeat of Mr. Stout's Ministry by an amendment, expressive of want of confidence, to the Address in Reply being carried.

Aug. 28, 1884.—Appointment of a Ministry under the premiership of Major Atkinson.

Aug. 29, 1884.—Defeat of Major Atkinson's Ministry on a vote of want of confidence.

Sept. 3, 1884.—Appointment of a Ministry under the premiership of Mr. Robert Stout.

Nov. 8, 1884.—An Act passed to enable certain loans of the New Zealand Government to be converted into inscribed stock and the accrued sinking funds released.

Aug. 1, 1885.—The New Zealand Industrial Exhibition opened at Wellington.

June 10, 1886.—Volcanic eruptions at Tarawera, and destruction of the famed Pink and White Terraces; 101 lives lost.

May 28, 1887.—Defeat of Sir Robert Stout's Ministry.

July 15, 1887.—Dissolution of the General Assembly, after prorogation, on the 10th June.

July 21, 1887.—A Proclamation issued declaring the Kermadec Islands to be annexed to and form part of the Colony of New Zealand.

Aug. 17, 1887.—Kermadec Group annexed to New Zealand. Flag hoisted and proclamation read at Sunday Island.

Oct. 8, 1887.—Appointment of a Ministry under the premiership of Major H. A. Atkinson, Sir Robert Stout's Ministry having resigned in consequence of the result of the election.

Dec. 19, 1887.—An Act passed to reduce the number of members of the House of Representatives, after the expiration of the General Assembly then sitting, to seventy-four, including four Maori representatives.

Dec. 23, 1887.—The Australian Naval Defence Act, being an Act to provide for the establishment of an additional naval force on the Australian station, at the joint charge of the Imperial and the several Colonial Governments, was passed by the New Zealand Legislature.

Oct. 27, 1888.—Formal Proclamation of British Protectorate of Cook group of islands, by Captain Bourke, R.N., of H.M.S. "Hyacinth."

Mar. 22, 1889.—Departure of Governor Sir W. F. D. Jervois, G.C.M.G., C.B., from the colony.

Mar. 23, 1889.—Assumption of the Government by Sir James Prendergast.

May 2, 1889.—Arrival of the Earl of Onslow, G.C.M.G.

Sept. 2, 1889.—Electors prohibited by statute from voting in respect of more than one electorate at any election for the House of Representatives.

Nov. 26, 1889.—Opening of South Seas Exhibition, Dunedin.

Dec. 5, 1890.—First election of members of the House of Representatives under a practical manhood suffrage, and on the one-man-one-vote principle.

Jan. 24, 1891.—Notification by Governor of acceptation of resignation (during the recess) of the Hon. Sir H. A. Atkinson's Ministry. Appointment of a Ministry under the premiership of the Hon. John Ballance.

April 22, 1891.—Proclamation by Governor of New Zealand to inhabitants at Rarotonga of appointment of British Resident for the Protectorate of the Cook Islands.

May 25, 1891.—Adhesion of Australia to Postal Union.

Aug. 19, 1891.—Labour-laws: Passing of Employers' Liability Act 1882 Amendment Act

Aug. 29, 1891.—Labour-laws: Passing of Truck Act, to prohibit payment of wages in goods or otherwise than in money.

Sept. 8, 1891.—Passing of Land and Income Assessment Act for purposes of taxation, and repeal of property-tax.

Sept. 21, 1891.—Labour laws: Passing of an Act for supervising and regulating of factories and workrooms. [Repealed by Act of 1894.]

Jan. 19, 1892.—Electoral districts of the colony based on population as ascertained by the results of the census of 1891 proclaimed.

Feb. 2, 1892.—Departure of Governor the Earl of Onslow.

Feb. 25, 1892.—Assumption of the Government by Sir James Prendergast, Chief Justice.

June 7, 1892.—Arrival of Governor the Earl of Glasgow, G.C.M.G.

June 28, 1892.—Death of Sir H. A. Atkinson, K.C.M.G., Speaker of the Legislative Council, and previously four times Premier.

Oct. 1, 1892.—Labour-laws: Passing of Contractors' and Workmen's Lien Act.

Oct. 8, 1892.—Passing of Dairy Industry Act. [Repealed by Act of 1894.]

Oct. 11, 1892.—Passing of first Land-tax and Income-tax Act on the basis of the Assessment Act of previous year.

Oct. 11, 1892.—"Land Act, 1892": Lease in Perpetuity without revaluation system introduced: occupation with right of purchase: optional method of selection: small farms associations.

Oct. 8, 1892.—"Land for Settlements Act, 1892," authorising purchase of lands from individuals for purposes of subdivision. [Repealed by Act of 1894. See *post.*]

April 19, 1893.—Cheviot Estate taken over by Government under the Land and Income Assessment Act.

April 27, 1893.—Death of Hon. John Ballance, Premier of New Zealand.

May 1, 1893.—Resignation of the Ministry in consequence of the death of the Hon. John Ballance, and appointment of a new Ministry under the premiership of the Hon. R. J. Seddon.

June 23, 1893.—Death of Sir William Fox, K.C.M.G., four times Premier of New Zealand.

Sept. 2, 1893.—Passing of Bank-note Issue Act, to make bank-notes a first charge on assets and to enable the Government to declare them to be a legal tender, &c.

Sept. 8, 1893.—The Legislative Council of New Zealand passed, by a majority of two, the Bill conferring the franchise on women.

Sept. 14, 1893.—Banks and Bankers Act Amendment Act passed, to permit of increase of capital by issue of new shares.

Sept. 19, 1893.—"The Electoral Act, 1893," extending franchise to women.

Oct. 2, 1893.—Alcoholic Liquors Sale Control Act passed: New licenses to be granted subject to the votes of the electors: reduction or abolition of licenses if desired.

Oct. 6, 1893.—Passing of "Criminal Code Act, 1893."

Oct. 6, 1893.—Labour-laws: Passing of "Workmen's Wages Act, 1893."

Oct. 6, 1893.—Native Land Purchase and Acquisition Act.

Oct. 20, 1893.—Sir James Prendergast appointed temporarily Deputy of the Governor.

Nov. 28, 1893.—A general election took place, being the first occasion on which women exercised the franchise.

Dec. 28, 1893.—Death of Right Rev. Dr. Henry John Chitty Harper, formerly Bishop of Christchurch and Primate of New Zealand.

Mar. 19, 1894.—Sir James Prendergast appointed temporarily Deputy of the Governor.

June 30, 1894.—Passing of Act to extend operation of Bank-note Issue Act, and another Act to control the transfer of bank shares.

June 30, 1894.—"Bank of New Zealand Share Guarantee Act, 1894," to guarantee special issue of shares to amount of £2,000,000, and purchase of Assets Estates Company by Assets Board. [Amended on July 20.]

July 20, 1894.—Passing of an Act to limit number of bank directors and power of shareholders to transfer their shares.

Aug. 21, 1894.—Labour-laws: Passing of Conspiracy Law Amendment.

Aug. 31, 1894.—Labour-laws: Passing of an Act to encourage the formation of industrial unions and associations, and to facilitate the settlement of industrial disputes by conciliation and arbitration.

Oct. 18, 1894.—"New Zealand Consols Act, 1894."

Oct. 18, 1894.—"Government Advances to Settlers Act, 1894," for relief of settlers burdened by high charges of interest, &c.

Oct. 18, 1894.—Passing of "Land for Settlements Act, 1894," authorising acquisition of private lands for purposes of settlement, with compulsory powers, and repealing Act of 1892; also "Lands Improvement and Native Lands Acquisition Act, 1894."

Oct. 18, 1894.—Labour-laws: Passing of "Shops and Shop-assistants Act, 1894," for limiting hours of business in shops.

Oct. 23, 1894.—Passing of "Banking Act, 1894."

Oct. 23, 1894.—Dairy Industry Act, to regulate manufacture of butter and cheese, with inspection and grading for export, and provide for purity of milk.

Oct. 28, 1894.—Wreck of s.s. "Wairarapa" at Great Barrier Island; 135 lives lost.

Mar. 29, 1895.—Death of Right Reverend Andrew Burn Suter, D.D., formerly Bishop of Nelson, and Primate of New Zealand.

May 27, 1895.—Government assumed management of the Midland Railway.

Aug. 3, 1895.—Death of C. W. Richmond, Puisne Judge of Wellington.

Aug. 20, 1895.—Trustees cemeteries authorised to provide for cremation of dead.

Sept. 4, 1895.—"Bank of New Zealand and Banking Act, 1895," providing for writing off paid-up capital with proceeds of first call on reserve liability. Also for new capital and Assets Realisation Board, &c. Also to purchase business of any other bank.

Sept. 20, 1895.—Labour-laws: Passing of an Act to regulate attachment of wages.

Sept. 20, 1895.—Labour-laws: Passing of Servants' Registry Office Act.

Sept. 20, 1895.—"Family Homes Protection Act, 1895," to secure homes for the people and to prevent them from mortgage or sale for debt.

Oct. 18, 1895.—Amended tariff passed.

Oct. 31, 1895.—Bank of New Zealand and Banking Act Amendment Act: Sale of Colonial Bank business to Bank of New Zealand.

Dec. 20, 1895.—Appointment of Sir P. A. Buckley, K.C.M.G., as a Judge of Supreme Court.

Jan. 10, 1896.—Hon. W. P. Reeves appointed Agent-General in London.

Mar. 26, 1896.—Brunner Mine explosion; sixty-seven deaths.

April 12, 1896.—General census of colony taken for Sunday night.

May 18, 1896.—Death of Sir Patrick Buckley, K.C.M.G.

July 11, 1896.—Appointment of Mr. W. B. Edwards as a Judge of the Supreme Court.

July 19, 1896.—Death of Hon. Robert Pharazyn, M.L.C.

Aug. 2, 1896.—Death of James Edward FitzGerald, C.M.G., Controller and Auditor-General.

Oct. 16, 1896.—Land for Settlements Act amended: Special provision made for disposal of highly improved lands acquired: preference given to landless people: Boards may select applicants, &c.

Oct. 17, 1896.—Alteration of franchise by abolition of non-residential or property qualification.

Oct. 17, 1896.—Government Valuation of Land Act passed.

Dec. 4, 1896.—General election of members of House of Representatives for the new districts as fixed by the Representation Commissioners on basis of Census, 1896.

Feb. 6, 1897.—Departure of the Earl of Glasgow, G.C.M.G.

Feb. 8, 1897.—Sir James Prendergast Administrator of Government.

June 22, 1897.—Diamond Jubilee of reign of Her Majesty Queen Victoria. Hon. R. J. Seddon, Premier of New Zealand, called to Privy Council, on occasion of his visit to England with contingent New Zealand Forces.

July 29, 1897.—Wreck of s.s. "Tasmania" at Mahia Peninsula, ten lives lost.

Aug. 10, 1897.—The Earl of Ranfurly assumed office as Governor.

Dec. 22, 1897.—Act to establish at Wellington the Victoria College, in connection with the New Zealand University.

July 15, 1898.—Hon. Sir Francis Dillon Bell, K.C.M.G., C.B., died.

1898.—Death of Sir George Grey, K.C.B.

1898.—Death of Bishop Selwyn, of Melanesia.

Oct. 15, 1898.—The Municipal Franchise Reform Act passed.

1898.—The Divorce Bill passed both Houses. Her Majesty's assent thereto gazetted 13th April, 1899.

Nov. 1, 1898.—An Act to provide for Old-age Pensions passed.

Feb. 10, 1899.—Rev. William Colenso died at Napier.

March 13, 1899.—Sir Julius Vogel, K.C.M.G., died.

April, 1899.—Victoria University College opened in Wellington.

May 25, 1899.—Resignation of Sir James Prendergast, Chief Justice.

June 1, 1899.—"The Divorce Act, 1898" (assented to by Her Majesty the Queen), came into operation.

June 22, 1899.—Sir Robert Stout, K.C.M.G., appointed Chief Justice.

Oct. 19, 1899.—Act passed constituting Labour Day. The second Wednesday in the month of October in each year to be a public holiday.

Oct. 21, 1899.—N.Z. Contingent (the first) consisting of 215 officers and men, left in s.s. "Waiwera" for Algoa Bay to assist the British in the Transvaal war.

Nov. 16, 1899.—General Assembly dissolved.

Dec. 6, 1899.—General Election of Members of House of Representatives.

Jan. 21, 1900.—The Second N.Z. Contingent (258 officers and men) left for South Africa in s.s. "Waiwera."

Feb. 5, 1900.—Hon. Thomas Dick died.

Feb. 17, 1900.—The Third N.Z. Contingent (264 officers and men) left for South Africa in s.s. "Knight Templar."

March 24 and 31, 1900.—The Fourth and Fifth Contingents (1,060 officers and men) left for South Africa in s.s.'s "Monowai," "Gymeric," "Waimate," and "Maori."

June 28, 1900.—"Bubonic Plague Prevention Act, 1900," passed.

Aug. 8, 1900.—"Immigration Restriction Act, 1899," assented to by Her Majesty in Council, came into operation.

Oct. 13, 1900.—Public Health Act passed.

Oct. 18, 1900.—The Maori Councils Act passed.

Oct. 20, 1900.—"The Representation Act, 1900," passed, increasing number of European representatives to seventy-six.

Dec. 29, 1900.—Hon. Sir James Prendergast, Kt., appointed Deputy-Governor.

Jan. 1, 1901.—Universal penny postage adopted by New Zealand.

Jan. 22, 1901.—Queen Victoria died.

Jan. 28, 1901.—Accession of King Edward VII. proclaimed in New Zealand.

Jan. 30, 1901.—Sixth N.Z. Contingent (578 officers and men) sailed for South Africa in s.s. "Cornwall."

Feb. 21, 1901.—Appointment of Mr. Theo. Cooper as a Judge of the Supreme Court.

March 31, 1901.—General census of the Colony taken for Sunday night.

April 6, 1901.—Seventh N.Z. Contingent (600 officers and men, roughriders) sailed for South Africa, per s.s. "Gulf of Taranto."

May 22, 1901.—Deceased Husband's Brother Marriage Act came into operation after Royal assent.

June 10, 1901.—Duke and Duchess of Cornwall and York arrived in New Zealand.

June 10, 1901.—Boundaries of Colony extended to include Cook and other Pacific Islands.

Aug. 6, 1901.—Sir John McKenzie, K.C.M.G., died.

Nov. 7, 1901.—State Coal-mines Act passed.

Feb. 1, 1902.—North Island division of the Eighth N.Z. Contingent sailed from Auckland for South Africa per s.s. "Surrey."

Feb. 8, 1902.—South Island division of the Eighth Contingent sailed from Lyttelton per s.s. "Cornwall."

March 12, 1902.—South Island division of the Ninth N.Z. Contingent sailed from Port Chalmers for South Africa per s.s. "Kent."

March 19, 1902.—North Island division of the Ninth Contingent sailed from Auckland per s.s. "Devon."

March 24, 1902.—End of Pacific cable landed in Doubtless Bay, Mongonui.

April 14, 1902.—North Island division of the Tenth N.Z. Contingent sailed from Auckland for South Africa per s.s. "Drayton Grange."

April 14, 1902.—Right Hon. R. J. Seddon sailed for London to attend Conference of Colonial Premiers, and to represent New Zealand at His Majesty the King's Coronation.

April 19, 1902.—South Island division of the Tenth Contingent sailed for South Africa per s.s. "Norfolk."

June 26, 1902.—Death of Most Rev. Bishop William Garden Cowie, Primate of New Zealand.

Aug. 9, 1902.—Celebration in New Zealand on the occasion of the Coronation of His Majesty King Edward VII.

Aug. 1902.—Return of N.Z. troopers from South Africa (Eighth Contingent left Durban 5th July; Ninth, 9th July; Tenth, 15th July).

Nov. 12, 1902.—General Assembly dissolved.

Nov. 25, 1902.—General Election of Members of House of Representatives.

Dec. 8, 1902.—Pacific (all red) Cable-service opened for international business.

Dec. 31, 1902.—Export of frozen-meat for year valued at £2,718,763.

Dec. 31, 1902.—Export butter and cheese for year valued at £1,369,341.

Feb. 8, 1903.—Hon. W. Rolleston died.

Mar. 16, 1903.—Sir George Whitmore, K.C.M.G., died.

May 22, 1903.—Mahuta Tawhiao Potatau te Wherowhero (formerly known as the Maori King), summoned to the Legislative Council, and sworn in as a member of the Executive Council of the Colony.

May 24, 1903.—Empire Day proclaimed in New Zealand (anniversary of birth of late Queen Victoria).

June 29, 1903.—Opening of Parliament (the fifteenth).

Sept. 11, 1903.—Mr. F. R. Chapman appointed a Judge of the Supreme Court.

Nov. 18, 1903.—State Fire Insurance Act passed.

Nov. 24, 1903.—Preferential and Reciprocal Trade Act passed.

Jan. 5, 1904.—Hon. W. C. Walker, C.M.G., died.

June 20, 1904.—Assumption of the Government of New Zealand by Lord Plunket.

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